Infantry





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MICHAEL P.W. STONE Secretary of the Army

MG CARMEN J. CAVEZZA
Commandant, The Infantry School

ALBERT N. GARLAND Editor, INFANTRY



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# Infantry

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# Commandant's NOTE

MAJOR GENERAL CARMEN J. CAVEZZA Chief of Infantry

### THE SOLDIER SYSTEM

The most important combat multiplier the United States Army has is the soldier. The soldier is, in effect, part of a complex system of systems that also includes everything personally worn, carried, or consumed in a tactical environment.

Historically, soldier items have been designed against separate, unrelated requirements, often by independent organizations, and then fielded piecemeal. Funding support has been fragmented. In general, soldier systems have not fared well when competing against major hardware systems for resources.

As the conscience of the Army for the individual soldier, the Infantry School is dedicated to improving the soldier's combat effectiveness. Undergirding this effort are two Department of the Army initiatives announced in recent years—the Soldier Modernization Plan (SMP) and the Soldier Enhancement Program (SEP).

The SMP covers the full range of research, development, acquisition, and fielding programs for the soldier. It is a total Army effort that includes input from all U.S. Army Training and Doctrine Command (TRADOC) schools. The basic strategy is to draw upon recent achievements and advances in state-of-the-art technology in industry, the technical expertise found in the Army itself, and the knowledge gained by the other U.S. military services, academia, and our allies in an effort to integrate those achievements and advances into our soldiers' warfighting capabilities.

The SMP provides an evolutionary approach to solutions by outlining near-term, mid-term, and far-term objectives in lethality, command and

control, survivability, mobility, and sustainment. The near-term (Fiscal Years 1991-1993) and midterm (FYs 1994-1997) are transition periods. The far-term envisions fielding a Block I soldier as a system during the period of FYs 1998-2006 and a Block II future soldier system in FY 2007 and beyond.

A basic precept in soldier modernization is the realization that while the greatest possible commonality and interchangeability are highly desirable, significant differences exist among various groups of soldiers in terms of the threat they face, their operational environment, and the load they have to carry. These differences frequently warrant specialized solutions. To recognize their unique needs and to ensure the proper determination of requirements, soldiers will be classified as dismounted combat soldiers, combat crew soldiers (air and ground), and soldiers.

The Soldier Integrated Protective Ensemble (SIPE) Advanced Technology Transition Demonstration (ATTD) is an ongoing program that exemplifies the SMP strategy and the soldier system approach to improving combat effectiveness. Although the initial emphasis of the SIPE effort is on the dismounted soldier, the multitude of diverse technologies will have broad applications for all soldiers.

The SIPE ATTD will exploit the most promising high payoff technologies and engineer a modular head-to-toe fighting system that provides a soldier improved lethality and survivability against multiple battlefield threats as well as improved sustainability. A consistent interrelated group of items will be centrally funded and fielded to maintain the integrity of a block of integrated soldier system capabilities.

The main purpose of the Soldier Enhancement Plan (SEP), which began in Fiscal Year 1990, is to develop, obtain, test, and field items in the near term (preferably off-the-shelf items) that pass the "common sense test" of experienced soldiers. The planned outcome will be to increase our soldiers' combat effectiveness through improved personal equipment and more lethal infantry weapons, and through further improvements in weight reductions, durability, reliability, ease of use, survivability, and communications and navigational aids.

Congressional funding for the program has been approved through FY 1991, and the Army will continue the program into the future, but at reduced levels.

There are four major project categories within the Army SEP:

- Weapons and munitions.
- Combat clothing and individual equipment.
- Electronic communication and navigational aids.
  - Food, water, and shelter.

More than 30 potential projects are currently included in the program and 13 are on a waiting list pending the availability of funds. Items currently fielded for use or in the hands of soldiers for testing include an assault pack for the M249 squad automatic weapon, intermediate cold/wet gloves, and improved flashlights.

Other examples of items that are included in this program are advanced rifle grenade munitions, optics for light weapons, laser/ballistic eye protection, an improved desert combat boot, improved desert and hot weather battle dress uniforms, and individual ration heating devices.

Parts of the Army management structure are now changing to implement these initiatives and to reflect emphasis on the soldier as a system. A soldier system test bed is being considered to ease the transition from existing technologies to advanced integrated technologies. Leaders and

staff officers from throughout the Army are participating in these efforts.

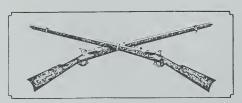
A Project Manager-Soldier (PM-Soldier) is being established within the Army Materiel Command (AMC) to manage the cost, schedule, and performance factors associated with the development, acquisition, and fielding of materiel for the soldier.

The TRADOC commander has established the TRADOC System Manager-Soldier (TSM-Soldier) at Fort Benning to serve as the conscience of the Army for *all* soldiers and as the Army's centralized manager and integrator for all combat development user activities associated with the soldier as a major battlefield system. TSM-Soldier will intensively manage the soldier as a "system of systems" to make the most of the soldier's lethality, command and control, survivability, sustainment, and mobility.

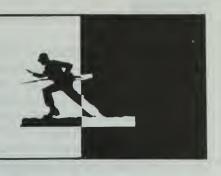
The offices of TSM-Soldier and PM-Soldier are staffed with dedicated military and civilian professionals. Their sole aim is to ensure that the U.S. soldier is the best led, best trained, and best equipped soldier in the world, ready for combat anywhere in the world on a moment's notice.

No program is better than its input. There is a definite need for ideas from current users in the field, and we hope our readers will step forward. The soldier in the field is the one closest to the problems and also the one most eager for solutions. Any soldier who has an idea should bring it forward for examination. If you have a proposal and do not know what to do with it, you can submit it through the Army Suggestion Program Manager in your command, who will make sure it is sent on to the proper office. Additionally, you are encouraged to send any suggestion you may have directly to Commandant, U.S. Army Infantry School, ATTN: ATSH-TS, Fort Benning, Georgia 31905. You may also call TSM-Soldier at DSN 835-1189 or commercial (404) 545-1189.

The efforts we have undertaken should not be conducted in a vacuum. We need input from all concerned. Let us hear from you!



# INFANTRY LETTERS



### U-COFT EFFECTIVENESS

In response to the article "U-COFT Effectiveness," by Walter G. Butler (INFANTRY, March-April 1991, pages 15-18), the MI/M2 U-COFT is an effective gunnery tool when it is used as part of a gunnery training program. The author implies that the U-COFT is the end-all to qualification. It is not, and it is important to realize that a gunnery training program also includes gunner selection, crew selection, the Bradley Gunnery Skills Test (BGST), fire command training, manipulation training, gun theory, and motivation.

After a number of years with the Bradley at Fort Benning, two Bradley company commands, and now at the National Training Center, I still see instances in which crews cannot properly load their weapons, boresight their systems, or fix minor malfunctions. The U-COFT cannot train a crew in these areas.

To conduct a successful gunnery program, a commander must first pick and stabilize his crews. All the crews must then pass the BGST, take part in gun theory classes, practice gun lay and manipulation, and then conduct U-COFT training.

The author of the article also says a crew that does not do well in the U-COFT will not do well during live fire gunnery. This is true. But a good commander, along with his master gunner, will look at the printout from the U-COFT to determine which area that crew is weak in and assign it to remedial training to correct its deficiencies. Then the crew will go back into the U-COFT, successfully complete its exercises, and be on its way to an outstanding qualification.

The article refers to a crew receiving two hours of U-COFT training a month and completing 50 exercises in four to five months. This is not quick enough. If a crew receives only two hours a month, these soldiers will not retain enough and their skills will continue to degrade.

Each battalion size unit has its own U-COFT. With an aggressive scheduling program orchestrated by the S-3, and using all the instructor operators available in the battalion, a company could get each of its crews 8 to 12 hours of U-COFT time a month. This would result in highly trained crews and would be workable, given a normal unit's other duties such as guard, police, and other scheduled training.

The U-COFT is a great simulation, but it cannot stand alone in training killer crews. The Air Force also uses simulations to train its pilots, but it couples this training with a number of flying hours. The Army should do the same thing and couple the U-COFT with good hands-on training to turn out highly trained and motivated Bradley crews.

JOHN F. DAGOSTINO MAJ, Infantry National Training Center Fort Irwin, California

### MARKSMANSHIP WITH CHEMICAL MASKS

While I understand that INFANTRY does not necessarily reflect the official Army position, and that its "Swap Shop" items represent an exchange of ideas, I am very concerned about the item in the March-April 1991 issue (page 44) on marksmanship with chemical protective masks.

This item presents a method of firing an M16 rifle while wearing an M17 protective mask. While this method may yield acceptable accuracy with the rifle, it poses serious threats to the mask and the soldier in a chemical environment. The major concern with using this method is the likelihood of breaking the man-mask seal. This could expose the soldier to the very chemicals from which the mask is designed to protect him.

A secondary concern is the possibility of damaging the voicemitter, which might not cause leakage immediately but could render the mask unserviceable.

A doctrinally sound technique for mission oriented protective posture (MOPP) is shown in FM 23-9, M16A1 and MI6A2 Rifle Marksmanship. This method offers acceptable accuracy and does not place the soldier or the mask at risk. Additionally, the U.S. Army Chemical School is now coordinating with the Infantry School in an effort to expand Common Task #071-311-2007, Engage Targets with an M16Al and M16A2 Rifle, to include MOPP conditions and MOPP firing techniques.

JAN R. ROBERTS COL, Chemical Director of Training U.S. Army Chemical School Fort McClellan, Alabama

### RIFLE MARKSMANSHIP

I read with interest the two articles on rifle marksmanship in INFANTRY's March-April 1991 issue—"Rifle Marksmanship Lessons," by Captain Philip K. Abbott (pages. 38-39), and "Marksmanship and the 'New Focus'," by Captain J. Mark Chenoweth (pages 39-41). As a retired Marine master gunnery sergeant, I hope the Army does consider instituting the suggested changes, especially in returning to the knowndistance (KD) range.

Every Marine up through gunnery sergeant, and up to the age of 40, fires his service rifle annually. (Marine officers have similar requirements.) All staff noncommissioned officers and field grade officers also must requalify annually with the pistol until their separation from active duty.

In recent years, the Corps has placed more emphasis on marksmanship. Failure to requalify with his authorized weapon can be damaging to a Marine's career; the failure is noted on his fitness report, which in today's shrinking and competitive Corps all but guarantees that he won't be selected for promotion.

Negative incentives aside, annual requalification on a KD course makes sense. It gave those of us who were not infantry and not in combat arms-related military occupational specialties an opportunity to become comfortable with and knowledgeable of our weapons. I was never a distinguished shooter, but I did shoot expert at various times. I also always knew I was going to qualify, if only to set the example to those around me.

Shooting the range was a challenge, and it was fun. It boosted my morale to break from some desk assignment and get out in the predawn, call my shots, and receive the instant gratification of seeing the white disk roll past the target from 500 meters. It gave me confidence in my fellow Marines, for I really believed that Marines, on the average, were the best military riflemen in the world. Over the years, I got better and enjoyed giving hints and tips to junior Marines. I took pride, when I had the opportunity, in giving marksmanship classes and then watching those Marines who listened apply the principles taught on the range.

Like all Marines, I learned early in my career, and later in Vietnam, that it isn't the noise from the rifle or the number of rounds you put out that counts. It is the hits, and that takes discipline. You won't hit anything if you don't believe in your shooting abilities and don't know your weapon.

I was with a unit of Korean Marines set up in a predawn ambush in the Vietnamese countryside when they spotted a single Viet Cong soldier, returning as point from a night mission. Several of the Korean fire teams, apparently lacking in marksmanship training, opened up on the soldier from 300 yards and missed. As he beat a path toward the nearest treeline, a U.S. Marine corporal working with the Koreans dropped him at 500 yards from the off-hand with one 7.62mm round from his M14 rifle. Was this just a lucky shot? Maybe. But the Marine smiled and said, "Not bad for a guy who barely managed to qualify as a marksman in boot camp!" I believe he hit that Viet Cong soldier because he knew he would.

Over the years I watched the Marine Corps introduce the Weaponeer and experiment with other simulators. These are wonderful training devices, but they are used to reenforce what Marines have learned through firing the KD course annually, not as a substitute for that firing.

In today's high-tech military environment, we often forget that being able to shoot accurately is what soldiering is all about. A good rifleman, with one well-aimed shot, can slow and pin down a large unit. That also saves money in expended artillery and air-delivered ordnance. It is demoralizing to an enemy to be picked off at a great distance. Disciplined and well-trained riflemen don't fire on automatic at everything that moves. Rear echelon Marines, when trained, prove to be very effective riflemen in the defensive. Usually, when the fighting does come to them, it gets dangerously close-too close for anything but rifle, pistol, and bayonet. They had better understand their weapons and be confident in their shooting abilities. If they're not, they will put their selectors on automatic, pile up empty magazines, and run empty at a time when resupply is, at best, tenuous.

If possible, every man and woman in the Army should have lessons learned on a KD course drilled into them and should take as much pride in mastering their weapon as they do in mastering their other military skills.

The Army has some intelligent, well motivated men and women who deserve to be taught such basic skills. Captain Abbott's suggestions come from a

proven training system. I feel confident that the soldiers in the Army would respond favorably to returning to a similar system, and that the benefits would show up where it counts — on the battlefield.

R.R. KEENE Assistant Editor LEATHERNECK Quantico, Virginia

### LOW INTENSITY CONFLICT

Colonel Richard T. Rhoades' article "Low Intensity Conflict: What Captains Should Study" (INFANTRY, March-April 1991, pages 10-12) is a good vehicle for further thinking about the future that faces us all, so I'd like to straphang on his comments with some thoughts and tips of my own.

He correctly identifies the term "LIC" as a basket (or perhaps "basket case") that holds diverse operations. And, as one that has taken on a life of its own, it is counterproductive to an understanding of the nature of the environment. Some would argue vehemently that the intensity of the "small war" in Panama was anything but low.

Pre-deployment training may be key to success (or prevention of failure) in an environment in which the psychological is to the tactical as the World Series is to T-ball. As elements of the 7th Infantry Division found in Panama before JUST CAUSE, and as our DESERT SHIELD troops found, seemingly innocuous actions can have consequences out of all proportion to their size—witness the daily confrontations with the Panamanian Defense Force, or the sight of female soldiers in PT gear in Saudi Arabia.

While Colonel Rhoades suggests liaison with the State Department and the Central Intelligence Agency, I suggest a call or visit to the regionally oriented special operations element to whose area a unit will deploy. Special Forces, civil affairs, and psychological operations units (both Active Army and Reserve Component) are required to be culturally aware of their area of

operations, must have been down range numerous times, and must have a language capability (albeit limited in some areas).

As the beginning of an acclimatization program that should identify what's important in what is likely to be a very different society, the S-2 or G-2 should obtain a copy of the basic psychological study that outlines the society, its culture, and its mores.

For some readings that sharply illustrate the different (and often difficult) nature of military operations short of war, I offer an article and three books:

In the article, "Uncomfortable Wars: Towards a New Paradigm" (PARAME-TERS, U.S. Army War College, Volume XVI, No. 4), General John Galvin, no stranger to warfare anywhere along the conflict continuum, writes eloquently that as the nature of the threat to our national interests changes, leaders must expand their thinking about the nature of warfare and about how we might adapt to a changing reality (as we saw Longstreet trying to persuade Lee in *The Killer Angels*).

The three books that speak to the frustrations of, and operations in, military operations short of war are *The War of the Running Dogs* (Malaya, 1948-1960); *Street Without Joy*, by Bernard Fall (First IndoChina War, 1946-1954); and *A Savage War of Peace*, by Alistair Horne (Algeria, 1954-1962).

I have not recommended any works on our involvement in Vietnam, but I believe strongly that each of us must study that war from all sides and come to our own understanding about its meaning. Don't let the talking heads and Hollywood tell you what the Vietnam Syndrome means. It is only slightly incongruous that most of us young guys know more about the three days at Gettysburg than we know about our longest war.

Finally, Colonel Rhoades orients the map to the ground by stating that "we must study and prepare now for low intensity conflict operations" — study and preparation that cause a soldier to believe that in this most psychological of all operational environments, indi-

vidual actions can have strategic consequences. In a scenario where the LIC imperatives of political dominance, unity of effort, adaptability, legitimacy, and perseverance are overriding, an understanding of their role in mission accomplishment should be a weapon that is part of every unit's basic load.

ROBERT C. LEICHT MAJ, Special Forces Thousand Oaks, California

### M3 AS TOW VEHICLE

I read with great interest Lieutenant Colonel E.W. Chamberlain's suggestion that antiarmor companies should be equipped with the M3 Bradley instead of the improved TOW vehicle (ITV). (See letter in INFANTRY's March-April 1991 issue, page 3.) As one of the wags who originally dubbed the ITV the "interim TOW Vehicle," I've long wondered why the M3 wasn't adopted for tank killing duty in these companies.

If Colonel Chamberlain's suggestion receives serious attention, though, several modifications to the antiarmor platoon's TOE should be considered.

First, a dismountable TOW system should be included as part of the vehicle's equipment. (Currently, the TOW components of the Bradley are permanently installed.) This would mean the addition of a missile guidance set (MGS), a traversing unit, a launch tube, a tripod, and at least two battery assemblies for the MGS. Say what you want about the M901 and M220 TOW vehicles, at least their crews enjoy the tactical option of dismounting their TOW systems.

Second, the antiarmor squad should be increased from four to five soldiers to allow for a three-man heavy weapons dismount team. The fifth soldier, a dismount loader (11 H), would load the TOW system while it was ground mounted. This soldier would also help provide local security while the squad remained mounted. The Bradley TOW loader (11 H) would serve as the dismount TOW gunner. These two soldiers and the squad leader would form the heavy

weapons dismount team. If the squad leader elected to keep the squad mounted, the Bradley TOW loader and the dismount TOW loader would also man an observation post.

Third, a laser designator should be part of the squad's equipment. FM 6-30 describes several different types of designators that antiarmor squads could be equipped with, depending upon the terrain. This would allow the dismount heavy weapons team to deploy a tripod-mounted laser designator if the situation warranted it.

The addition of a laser designator would not supplant the mission of the Air Force's forward air controllers or the field artillery forward observers, or the helicopter scouts, for that matter. Rather, it would improve the battalion task force's ability to acquire targets. The gunnery skills of 11H soldiers well prepare them to use a laser designator. The fire control discipline of antiarmor sections and platoons goes a long way toward avoiding duplicate laser designation errors.

The antiarmor company, working with the FSO and the S-3 Air, could provide vital sets of highly trained eyes to spot and defeat enemy target arrays at long range. This mission would greatly strengthen the company's overwatch capabilities, reduce friendly fire casualties, and point the way to the future.

Antiarmor squads of the twenty-first century are likely to have a variety of tank killing weapons. Kinetic energy weapons will penetrate heavier enemy armor at greater ranges. Dual-power directed energy weapons will defeat enemy optical guidance systems and guide smart munitions. Ground-launched guided missiles fired from behind terrain features will seek out laser designated enemy vehicles. Automatic grenade launchers of heavier caliber and greater range will defeat and mark thin-skinned vehicles in dead spaces on the battlefield.

We could develop twenty-first century tactics for these weapons with equipment that is in the inventory today. The M3 Bradley will provide a wonderfully adaptable antiarmor weapon platform

for years to come, but only if we adopt Colonel Chamberlain's suggestion soon.

W.H. HAYES ILT, Infantry U.S. Army Reserve Lincoln, Nebraska

### VETERANS OF THE BATTLE OF THE BULGE

The 10th Annual Reunion of the Veterans of the Battle of the Bulge will take place 5-8 September 1991 in Charleston, South Carolina. All servicemen who served in the Battle of the Bulge, their families, and friends, are invited to attend.

Anyone who would like additional information may write to me at P.O. Box 11129-R, Arlington, VA 22210-2129.

NANCY C. MONSON

### FORMER FORT BENNING RESIDENTS

Fort Benning is supporting a plan to make each set of quarters on the post that is more than 50 years old a monument to the people who have lived there. There are 492 such quarters. The plan is to place inside each set of quarters small metal plates bearing the occupants' names and dates of occupancy.

The program is now directed at

officers only, but it may grow to include enlisted residents later.

The post has records of occupants from 1977 forward, and the residency of some officers before then has been pinned down. What we need now is to locate some old post directories or telephone books dated before 1977, and to identify individuals who have lived on the post in past years who might be able to help round out our information.

Anyone who can help with this project may contact me at 3616 N. 36th Road, Arlington, VA 22207, telephone (703) 527-6181; or Colonel B.D. Wheeler, 5001 Donna Sue Drive, Columbus, GA 31907, telephone (404) 563-0453.

ELLIS W. WILLIAMSON MG, U.S. Army (Retired)

### LETTERS FROM DESERT STORM/SHIELD

I am seeking first-person accounts of Operation DESERT SHIELD/DESERT STORM or the aftermath — letters, diaries, essays, jokes, audio-cassette recordings — for national publication in a new book, *Letters from the Storm*, a portrait of the American experience in the Persian Gulf, in the words of the men and women who took part.

Send written materials, IBM-compatible diskettes (3½-inch or 5½-inch), audiocassettes to me at 4401-A Connecticut Ave., N.W., Suite 296,

Washington, DC 20008; fax to (202) 244-4523; E-mail to MCI Mail ID #4661205.

Be sure to include your name, rank, address, age, and unit. Confidentiality will be respected. Please enclose a stamped, self-addressed envelope for the return of materials. If you have any questions, call me at (202) 364-8625.

### STEPHEN MENICK

### UNIT HISTORY BIBLIOGRAPHY

I am in the process of compiling the second supplement to my *United States Army Unit Histories: A Reference and Bibliography*, published in 1983.

I would like to include in that supplement any unit histories published by units that participated in Operation DESERT SHIELD/DESERT STORM. If your unit intends to or has published a history, no matter how small, I would appreciate knowing about it so I may include the title in that supplement.

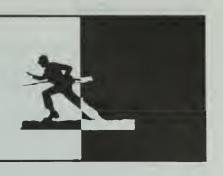
I would also be interested in hearing from other units that may have printed books, booklets, or pamphlets, or that may have printed yearbooks or histories concerning their units. I maintain a large library of such titles for my research and am always interested in obtaining more. I am willing to pay for them.

My address is 97 Mayfield Street, Springfield, MA 01108.

JAMES T. CONTROVICH



# INFANTRY NEWS



### CHIEF OF INFANTRY UPDATE

EDITOR'S NOTE: Infantrymen are encouraged to comment on the items that appear here and to suggest topics they would like to see covered in the future. Address suggestions to Commandant, U.S. Army Infantry School, ATTN: ATSH-TDI, Fort Benning, GA 31905-5593, or call DSN 835-2350/ 6951 or commercial (404) 545-2350/ 6951.

THE M4 CARBINE is a gasoperated, air-cooled, selective fire shoulder weapon. It is fed by either 20or 30-round M16 magazines, and its function is identical to that of the M16 family of rifles.

Eighty-five percent of the parts found in the M4 carbine are compatible with those in the M16A2 rifle, which greatly simplifies training, maintenance, and supply. It is ten inches shorter and one and one-half pounds lighter than the M16A2 rifle but has the same accuracy and maximum effective range.

The M4 carbine will replace all M3 submachineguns and selected pistols and rifles. A one-for-one swap of M4 carbines for M16A2 rifles in the 82d Airborne Division is planned. This will be more clearly defined when a new basis of issue plan (BOIP) is created.

The M4 was type classified in March 1991, and is scheduled to reach the field in the second quarter of FY 1994.

The Infantry School POC is MAJ Witty, DSN 835-1644, commercial (404) 545-1644.

RIFLE OPTICS will be mounted on the M16A2 rifle, which will then be called the M16A3. Optics will also be placed on the M249 squad automatic weapon and the M4 carbine.

By enabling a soldier to sight better, these optics will improve his marksmanship, allow him to detect and more closely identify targets at extended ranges, and improve his ability to engage targets in low light conditions.

They will provide magnification between three-power and four-power with an illuminated reticle. The weapons will be altered to allow a soldier to maintain a correct spot- or stock-weld. Current plans are to equip light infantry soldiers at platoon level and below with the optics.

Final testing to select the best candidate will take place this summer. New marksmanship training programs that will make the most of rifle optic benefits are now being developed. The first unit is scheduled to be equipped during the second quarter of FY 1992.

The School POC is Major Witty, DSN 835-1644 or commercial (404) 545-1644.

THE BRADLEY FIGHTING vehicle is ten years old and has accounted for itself well since its initial fielding in 1981. At that time, it carried one infantry squad consisting of a three-man crew and a six-man dismount element, while providing armor protection against small arms projectiles and artillery fragments. It mounted a 25mm cannon that could defeat any equivalent fighting vehicle, carried TOW missiles that could defeat any known armor in the world, and was powered with a 500-horsepower diesel engine that gave it the speed and mobility it needed to keep up with the new turbine-powered Abrams tank.

The TOW was put on the Bradley because analysis showed that the 12 improved TOW vehicles (ITVs) in the antiarmor company were not enough to overwatch the threat and to add the tactical flexibility of eliminating the requirement to attach tanks for protection against threat armor.

Subsequently, firepower on threat fighting vehicles and tanks was improved in an effort to render both the Bradley's 25mm cannon and the TOW missile ineffective.

In response to this threat, a more powerful armor piercing round was developed for the Bradley's 25mm cannon, which allowed more firepower without the expense and added weight of a larger cannon. The TOW missile was improved to defeat the upgraded armor on threat tanks, and the Bradley's armor was strengthened to provide a level of protection against the threat's improved firepower capabilities.

Unfortunately, the strengthened armor resulted in a substantial increase in weight and a corresponding reduction in the Bradley's speed and mobility. That problem was then resolved by the installation of an improved 600horsepower engine.

The Bradley now enjoys the same advantages it had when it was first fielded. Current tactics call for one full infantry squad, split between two Bradleys, to be transported under what is known as the 2x2 concept. Two Bradleys operate as a team transporting two fire teams, the squad leader, and the crews. The Bradley still serves as a highly mobile troop carrier while providing an increased level of armor protection. Its firepower remains effective against the threat fighting vehicles

and tanks now in the field, and the Bradley continues to have the necessary speed and agility to permit it to be used with the Abrams tank.

The Bradley has matured well during its first ten years and appears to have the growth potential to maintain its role well into the next century.

The School POC is Mr. Brabston, Directorate of Combat Developments, Mobility Branch, DSN 835-1618 or commercial (404) 545-1618.

THE HMMWV INTERCHANGE mount system (HIMS) will give units equipped with M966 HMMWV (high mobility multipurpose wheeled vehicle) TOW carriers low cost, quick, and effective options for tailoring their forces.

The system gives a commander options for deploying an automatic weapon platform instead of a TOW carrier on the basis of contingency missions. The HIMS contains two parts.

Part one is a pintle/panel assembly that mounts on the M1025 armament carrier. The assembly, without modifications, is interchangeable with the missile guidance tray on the M966 TOW carrier.

Part two consists of a locally fabricated internal floor stowage plate that has automatic weapon stowage bracketry already mounted for faster emplacement. After selected items of the TOW bracketry have been removed, this plate is mounted in the floor of the TOW carrier (using the six cargo tie-down

A concept evaluation program was conducted by units of the 3d Brigade, 82d Airborne Division at Fort Bragg during February and March of 1990. The results of the program indicated that 11H crewmen can be trained first to install the interchange mount system weapons mounting (MK19 40mm and M2 .50 caliber machineguns), then to ground mount them, and to return them to the mounted TOW configuration. This training can be conducted at the unit level by the platoon leader and platoon sergeant.

The crew and personnel load plans now used with the TOW configuration need only minor modifications. The additional firepower that the interchange mount system provides on the battlefield makes this system suitable and desirable.

The HIMS procedures were given a safety certification by the U.S. Army Test and Evaluation Command, Aberdeen Proving Ground, Maryland, in June 1990. A technical data package and an instructional video were recently distributed to the field.

The Infantry School POC is Mr. Boozer, Mobility Branch, Directorate of Combat Developments, DSN 835-1618 or commercial (404) 545-1618.

NO DEDICATED HOUSING is now available at Fort Benning for Infantry Officer Advanced Course (IOAC) students. Students should report seven days before their classes are scheduled to begin so they will have time to find housing.

The Department of the Army authorizes seven days of permissive TDY (temporary duty) in conjunction with a PCS (permanent change of station) move. This policy will be annotated on the PCS orders of incoming IOAC students.

A recent survey of IOAC students determined that it takes two or three days to find suitable housing in the Columbus, Georgia, area. Fort Benning authorizes four days of temporary lodging allowance for incoming PCS students to use while house hunting.

Incoming IOAC students will receive an Army Community Services welcome packet that provides housing information for the Columbus area, along with a welcome letter from the commander of the 1st Battalion, 11th Infantry, 90 days before the starting date for their class.

Further information is available from Company C, lst Battalion, 11th Infantry at DSN 835-2903.

INSTRUCTIONAL MATERIAL Catalog 91 offers a complete list of the instructional materials available from the Infantry School to support individual, unit, and staff training. The materials listed have been screened and carefully selected for their content, their teaching value, and their adaptability to individual unit training requirements.

The publications listed are updated and revised continually in close coordination with the School's resident instructional departments. This assures units the latest in instructional materials and learning innovations.

The materials include special texts, programmed texts, pamphlets, maps, and cards.

Copies of the catalog are available from the U.S. Army Infantry School, ATTN: ATSH-TDR-N, Fort Benning, GA 31905-5593.

THE INFANTRY LEADER Course (ILC), originally called the Light Leader Course and designed to train light infantry leaders, has been modified to provide dismounted training for mechanized, light, airborne, and air assault infantry units.

The standard course length is four weeks (28 days), but both the length and the subject matter can be modified to meet the needs of a unit. A mobile training team variant is also available for units that prefer to train at their home stations.

The course "reblues" and trains company level leaders to standard on selected individual and collective tasks. It emphasizes leadership, team building, troop leading procedures, command and control, communications, and individual and crew-served weapon proficiency. This training is accomplished through the use of drills, situational training exercises, and field training exercises.

The ILC, by providing an environment free of distractions, promotes unit cohesion and a singular focus on doctrinal training standards.

Class quotas are open for Classes 1-92 (beginning 8 October 1991) and 2-92 (beginning 12 November 1991).

For information concerning unit quotas or mobile training teams, units may call MAJ Bailey, Training and Doctrine Command (TRADOC), at

DSN 680-5601, or Mr. Ikner, Ranger Training Brigade, at DSN 784-7212/ 6980.

A HIGH QUALITY Infantry force is still being maintained as the Army "builds down." Commanders can look forward to receiving second lieutenants with outstanding potential.

When the FY 1991 ROTC/DA selection and branching board was held, more cadets requested Infantry than any other branch, and there was a considerable increase over last year in the number of engineering and science majors who requested Infantry. It was a decidedly competitive group, with two applicants for every active duty position. Infantry branch cadets were also near the top of the advanced camp and Professor of Military Science score averages for all branches.

A TRADOC-directed review of selection policies and procedures showed an emphasis on branch satisfaction for FY 1991. In fact, 95 percent of the Infantry officers coming on active duty

### RANGER COURSE SCHEDULE **FISCAL YEAR 1992**

had requested Infantry as their first choice of branch.

MORTAR INDIRECT FIRE teams will soon have short range practice ammunition for their 60mm, 81mm, and 120mm mortars. The 81mm M880 short range training round (SRTR) is scheduled to be fielded in December 1991 and the 60mm M840 SRTR in the first quarter of FY 1993.

The 81mm M880 — a heavy wall, hollow core, steel round without a high explosive (HE) filler — simulates the M821 HE round. When used with the M29Al sub-caliber insert (now under development), the 81 mm M880 round can be fired from the 120mm mortar.

The 60mm M840 SRTR, which has a die cast zinc alloy body without an HE filler, simulates the M720 HE round. With the 60mm sub-caliber insert, it can be fired from the 4.2inch mortar.

Both rounds have the M751 impact fuse (PD), which simulates the M734 multi-option fuse. Upon impact, the rounds have a signature consisting of a flash, bang, and smoke. No shrapnel is generated.

The SRTRs are designed to be fired on a 1/10-scale range, recovered, refurbished, and refired at least nine times. The rounds give mortar crews inexpensive and realistic training in handling ammunition and putting their weapon system through its full range of functions. They also enable forward observer, fire direction control, and mortar crews to train as a team.

THE REQUIREMENTS FOR BUR-IAL in Arlington National Cemetery have been a subject of inquiry in recent months.

If you are interested in learning about these requirements for future reference, write to Department of the Army, Arlington National Cemetery, ATTN: Chief, Interment Services Branch, Arlington, VA 22211-5003 and ask for free copies of two pamphlets titled Interment in Arlington National Cemetery and The Arlington National Cemetery Columbarium.

These pamphlets should answer any questions you may have. If they do not, don't hesitate to write to the office mentioned above. The people in that office have proved most helpful.

THE M157 SMOKE GENERATOR set - mounted on a HMMWV (high mobility multipurpose, wheeled vehicle) - is the first wheeled vehicle system for producing smoke while in motion.

The smoke set can move 15 to 20 miles per hour and can be turned on and off from a control panel in the cab of the vehicle. It creates smoke from fog oil to provide a screen or a means of deception on the battlefield.

The M157 has been fielded to light infantry divisions and corps smoke units throughout the Army.

A BIBLIOGRAPHY OF STUDIES on retrograde actions is available to authorized personnel. Requests should be made to DLSIE, ALMC, Fort Lee, VA 23801-6043; DSN 687-4655 or commercial (804) 734-4655.

THE REMOTE SENSING Chemical Agent Alarm (RSCAAL), the world's first "early warning" chemical agent detector, is now being produced under a U.S. Marine Corps contract. An Army contract is also expected.

The alarm uses infrared technology to detect chemical agents at greater distances and lower levels of concentration than any other detector. It detects agents at five kilometers and more, compared to a maximum of 400 meters for the systems the Army now uses.

It uses a spectroradiometer to scan for the infrared signatures given off by a wide range of chemical agents — both nerve and blister, including mustard gas - night and day, through dust, sand, and adverse weather.

The soldiers simply turn it on and point it in the direction to be scanned - usually upwind of their location. It operates unattended, automatically and continually. If it detects an agent, it sounds an alarm and gives a visual readout of the type of agent and the direction from which it was detected.

# PROFESSIONAL FORUM



# One Place, Three Wars: Part 2

**MAJOR GENERAL BERNARD LOEFFKE** 

EDITOR'S NOTE: This is the second article of a two-part series. Part 1 appeared in INFANTRY's May-June 1991 issue.

My experiences at West Point, at the Army schools, and the three tours in combat stressed for me the importance of devising a strategy that could be used to fight small conflicts. The three wars in Southeast Asia produced tactical lessons at the foxhole level. (These experiences contributed to the development of the strategy I call the Ten Ds. These can be applied to any area of the world.)

In Latin America, we are also fighting three different types of wars. We call them the war of subversion, the war on drugs, and the war on information.

As Americans we are interested mainly in what is happening to us. Unfortunately, a significant majority of the world is different from us, and we must understand those differences. There are lessons we can learn from our neighbors. Perceptions are important, and we must learn to walk in their shoes.

As an example, in Vietnam, we considered the Vietnamese dirty because they blew their noses without using

handkerchiefs. They considered us dirty because we blew our noses into handkerchiefs and then carried the dirty handkerchiefs in our pockets.

Similarly, Latin American officers are not happy with what the U.S. Army has labeled low intensity conflict. To them, the wars they are fighting are not low intensity but high intensity. El Salvador, with a population of six million, suffered more than 1,600 casualties in its armed forces in just the last 45 days of 1989. In November and December of 1990 the Salvadoran Army again suffered more than 1,700 casualties. For a small nation, more than 3,000 casualties in a three-month period is high intensity.

Our colleagues call their conflicts wars of subversion. In reality, a war is a war, and to be successful in combat, one must adhere to the nine basic principles of war — objective, offensive, mass, economy of force, maneuver, unity of command, security, surprise, and simplicity. It has been said that if we violate three of the nine in any battle, we stand a good chance of losing.

In combating subversives, however, I have used not the nine principles of war but the Ten Ds — democracy, development, defense, detection, deception, delay, decision, deployment, destruction, and dialogue. And it can be said that

if we fail to consider several of these Ds, we stand a good chance of losing to the subversives.

We have found that for subversion to occur, several ingredients are usually present. One of them is the dissatisfaction of the people with their government. This may be due to the illegality of the government. It may be because the government cannot provide the economic well-being that the people demand. It may be because the subversives, as is the case in El Salvador, have had a great deal of external support from neighboring countries. We have found that stability is improved by a democratic government and a serious effort aimed at developing the country's economy.

### THE 10 Ds

Democracy. When people have freely chosen their government, subversives have difficulty claiming that the government does not represent the popular vote. When I think of democracy, I think of the four freedoms — Freedom of Speech, Freedom of Religion, Freedom from Fear, and Freedom from Want. (The last is the most difficult to attain.)

**Development.** The economic well-being of a nation is critical for the happiness of the individual. No one likes

to be a recipient of aid. We all want individual jobs that will permit us to provide for our families and sustain our self-esteem. In Latin America, a majority of the people equate development with the three Ts: Trabajo (work), Techo (housing), and Tortillas (food). Democracy and development are basic to establishing a healthy environment.

Defense. Governments have a duty to protect their citizens. When we talk of defense, we include the security forces that provide the safety that is needed to live peacefully in our homes. Security of the individual is a basic duty that a government must provide. Today we find that terrorism can paralyze governments. Accordingly, the consolidation of all security forces may be necessary to combat subversion effectively.

The first three Ds are interrelated, and a nation has to use its resources wisely and in some order of priority. A historical example of one nation's priorities may prove useful. Interestingly, the example is a communist one:

The leader of the Peoples Republic of China, Mr. Deng Xiao Ping, provided four objectives to the Chinese nation in the following priority: agriculture, science and technology, industry, and defense. The Chinese generals were not happy that defense was placed last. Deng Xiao Ping convinced them that he really had placed them first. His logic was this: Agriculture was the most important objective, because hungry people are unhappy people. Hungry people have a good reason to take up arms and become guerrillas. If we don't satisfy the basic requirements of food to our population, we will have riots. And the Defense Forces will be constantly fighting Chinese when they should be protecting our borders.

The second and third priorities, the development of science and technology and industry, can be translated into providing jobs and heightening the standard of living for the members of our society. He explained that if a large portion of the population is unemployed, a large portion of the population will be dissatisfied. These people will then be receptive to ideas that offer a change of status. He explained that he was placing defense last because it was necessary for the security of the nation to have the first three priorities well developed.

In the Western world, we list democracy as our first priority. We believe that a government elected by popular vote is one of the best means by which we can insure tranquility. It is obvious that not all countries or peoples agree with this concept. There are some nations that want to experiment with different systems. Nevertheless, the legality of a government, whatever its social structure, is a strong weapon against subversion.

An effective defense has many ingredients. I have singled out detection, deception, delay, decision, deployment, destruction, and dialogue as pertinent to the wars in Latin America.

**Detection.** Effective intelligence is essential, and outstanding officers must be encouraged to seek intelligence assignments. In a war of subversion, the human source is very important. It has been said that a war of subversion is 90 percent intelligence and 10 percent operational. Detection procedures at times need to be used on friendly units. In El Salvador, brigade units use polygraphs (lie detectors). It is estimated that at least one percent of the soldiers are insurgent sympathizers. Detection by these machines is feared. When a test is announced for the next day, several soldiers will disappear.

Deception. History shows that effective deception techniques such as dummy traffic, weapons, vehicles, and antennas have diverted the enemy away from critical areas and at times forced him into ambushes. The Chinese consider deception so important that a general fails a unit if he does not detect some form of deception.

Winston Churchill remarked that in war truth is so precious that it must be guarded by a thousand lies. Deception is the business of the general as well as of the individual soldier.

In Panama, we required soldiers securing an ammunition dump to construct a dummy soldier from a target silhouette. The dummy would stand guard and would be moved every 15 minutes or so. In several instances, snipers fired in the dummy's general direction.

The enemy must be diverted by effective camouflage and the use of deceptive techniques to make our targets difficult to destroy. Chinese commanders are given higher marks for camouflage and deception techniques than for the correctness of their fighting positions. In fighting subversion, we must emphasize the importance of keeping the subversives off balance by deception.

Delay. If the enemy has been detected and we have attempted to deceive him but he has penetrated our perimeter anyway, we then must construct effective obstacles to delay and channel him as he approaches his target. These delays take many forms — obstacles, patrols, and again, deception techniques designed to confuse the enemy.

Decision. Communications must be in place to provide the decision makers with the means of communicating commands quickly to the reaction units. The tools must be available to allow the decision maker to issue timely decisions over reliable and secure communications.

Deployment. Reaction forces must have the mobility to reach the endangered position quickly. I am reminded of the techniques used by the government of Vietnam in 1964 to provide confidence to the outposts all over the country. The rule was that if any outpost could hold for 24 hours after it initially reported being hit by the enemy, that outpost would have reinforcements. The government employed the parachute units as the strategic reserve and initially tried to relieve an ambushed unit by ground means, but this often led to another ambush.

I was in El Salvador in the late 1980s when a patrol was ambushed, the company sent to relieve that ambush was ambushed, and the battalion sent to relieve that company was also ambushed. In all, the enemy soldiers conducted three separate ambushes and kept up their fire continuously for seven hours. It was only after the Air Force and air movement of forces that the ambushes were neutralized.

In Vietnam, the paratroopers had marked on their maps the locations of those posts that had been under attack for more than 17 hours. They knew they would have to jump into those places. The two combat jumps 1 made were into outposts that had been under attack for more than 15 hours. These outposts were glad to see parachutes overhead. Fresh paratroopers with air support were usually enough to cause the enemy to withdraw.

It is important to assure the population that the government will be able to react to help them in a fight. If it cannot provide that security, cooperation with the army will be difficult. A Venezuelan colonel stated, "It is not enough to have the people on the side of the Army; the government has to mobilze the people to actively support the Army."

Without security, the population cannot be expected to be responsive to the government. The first question villagers ask is, "How long will the Army be with us?" If the answer is weeks or months, the villagers will not be as willing as if the answer were "two years."

Destruction. The word "destruction" needs clarification. It is more effective to destroy a movement by having its members leave it than by killing them.

If we convince the subversives to leave their units, this is a greater victory than destroying them. We must realize that in the guerrilla ranks there are those who are not there of their own free will. The greatest threat to a guerrilla movement is from those who have left it. A strong psychological operations campaign and the proper conduct of the Army in an area of operations can help make this happen.

Dialogue. Negotiations are needed. We must provide opportunities for the opposition to talk to the government. At the height of the Cold War, the U.S. continued to talk with the Soviets. We call it detente, which means simply the relaxation of tensions. If two archers who are on opposing sides are 10 meters away from each other with their bows taut, and there should be a misunderstanding and one lets go of the bow, the other will do the same and the arrows will kill both archers. But if the bows are relaxed and there are then disagreements, both archers will need time to start bringing tension to their bows. Hopefully, through dialogue we can keep those arrows from being fired. It is much easier to avoid battles when tensions are low.

Even more important than the dia-

logue we have with the opposition is the dialogue we have with our neighbors. To be successful against subversion, we need to be united. Looking for ways to let us grow closer should be a priority task

The role of a leader is simply to keep hope alive. We are better off today than we have ever been. Communism is not the threat of the past. In fact, today communists are fighting communists — Soviets against Chinese, Chinese against Vietnamese, Vietnamese against Cambodians. All communists. What is important is the national interests of the nations. Our national interests in this hemisphere are for democracies that provide freedom to and respect of the individual. We in the military services have the role of keeping hope alive in this hemisphere, and we do this by living the motto of the School of the Americas. "One for all and all for one." We need to make that motto a reality.

Major General Bernard Loeffke is chairman of the Inter-American Defense Board in Washington, D.C. He previously served as XVIII Airborne Corps chief of staff; as commander, U.S. Army South; and as commander of a joint task force in Panama.

# **Brigade S-1's PSS Matrix**

### **MAJOR WALTER A. SCHREPEL**

A brigade S-1's responsibilities for coordinating tactical personnel service support (PSS) can sometimes be wideranging. In the 10th Mountain Division (Light Infantry), for example, a division ready brigade deployment can require the S-1, temporarily, to plan and manage a full range of services in the absence of a division G-1 cell. A PSS matrix can ease this burden by enabling

him to better manage his responsibilities.

At the root of his problem is the tension between mission essential tasks and mission specific tasks that he may have to manage at the same time.

The tasks on the mission essential task list (METL) for a functioning S-1 staff operation for combat are complex and time-consuming but also of major significance in sustaining the

brigade's operations. Our official manuals and the authors of articles that appear in our service journals naturally concentrate on these tasks. But Appendix A of Field Manual 101-5 also depicts the full range of tasks that might be on the S-1's mission specific task list (MSTL), either in combat or in some lesser form of conflict such as peace-keeping or peacetime contingency

missions (see accompanying box).

The scope of these tasks will depend, of course, upon an analysis of METT-T (mission, enemy, troops, terrain, and time), but the S-1 still needs to be prepared to execute any or all of them as the particular situation may demand. When these two sets of tasks come together in an operation, the S-1 may face a truly overwhelming problem. The brigade's limited personnel staff resources will affect his ability to perform these tasks.

A division ready brigade deployment on a contingency mission to an underdeveloped theater could be his most stressful environment. As the point element of a division deployment, or perhaps as the only formation deployed for that operation, the brigade S-1 would assume most of the responsibility allocated by the mission essential and mission specific task lists. This situation, until he was either relieved of the responsibility or his section was augmented by support personnel from corps, could be daunting, at least during the early phases of the operation. The sheer scope of the S-1 areas of responsibility — medical and medical service support, morale building, civilian labor, enemy prisoners of war (EPWs), finance support, replacements, and displaced civilians, among others — indicates the need for a flexible, continuous planning capability.

A PSS matrix offers one way for the S-1 to manage his many mission specific tasks, and it can be used to complement any charts that he may already be using for handling strength management and casualty operations. Our field manuals, for example, do not often describe how to manage the host nation labor at brigade or battalion level, yet this mission is vital to a light infantry unit that has to depend upon civilian labor to help sustain itself.

The quantifiable characteristics of the mission specific tasks are displayed along the horizontal axis of the matrix. It is assumed, of course, that these are subject to modification by a METT-T analysis. The units that are habitually assigned to the brigade are listed on the vertical axis.

### **BRIGADE S-1** MISSION ESSENTIAL TASKS

Coordinate strength accounting operations.

Coordinate medical service support. Coordinate replacement operations. Coordinate casualty management operations.

### **MISSION SPECIFIC TASKS**

Coordinate civilian labor operations. Coordinate morale, welfare, and recreation support.

Coordinate chaplain unit ministry

Coordinate legal service support. Coordinate postal service support. Coordinate public affairs support. Coordinate discipline, law, and order operations.

Coordinate finance service support. Coordinate the administration of enemy prisoners of war (EPWs) and civilian internees (CIs).

The column headings might be Civilian Labor, Replacements/RTDs, EPWs, Chaplain (UMTs), MWR Support, and Military Police/Finance Teams.

Civilian labor figures can easily be summarized to show the number of laborers working in support of the brigade. The S-1 tracks this information as he administers the program, and the chart supports the finance, pay, employment records, and emergency medical care the S-1 may have to coordinate. The numbers reflected on the matrix should track with the employment records that would be forwarded to the Division G-1. In the early stages of an operation, the matrix may stand as the record of labor requirements for hire that would be coordinated with the Division G-1 and G-5.

Replacements and Return to Duty (RTD) soldiers play a critical role in sustaining a light infantry brigade; in this low intensity conflict scenario, the RTDs will probably be the only rested soldiers. The crux of the problem commonly found at the Joint Readiness Training Center is the shortage of transportation assets to move the RTDs to their parent unit from the division or corps support area.

Nightly supply helicopters may be the primary means of supplying dispersed light infantry units and of extracting casualties in a dense air defense environment. The matrix offers a means of preparing a plan for moving RTD packages or individual replacements forward from the brigade support area (BSA). (If the main supply route were open, the task would be easier, since it would be only a matter of requesting trucks and awaiting their arrival.)

Similarly, administering enemy prisoners of war (EPWs) remains a critical task for the unit. For the light infantry, every soldier detailed to guard the EPWs drains the unit's combat power. The problem, as with replacements, is in managing transportation assets. It is critical to know the dimensions of the EPW problem, especially in a light brigade that does not have enough transportation. The problem does not disappear if a large number of EPWs are maintained at the brigade support area. Such tasks as providing guards, water, food, perhaps shelter and transportation assets are directly linked to the numbers reflected on the matrix.

The EPW column of the matrix can dovetail with administering displaced civilians (DCs) and civilian internees (CIs). Although a light infantry brigade is not likely to have the resources to help in DC operations, the S-1 still must track the movement of DCs in concert with the S-3 to channel them away from the likely areas of major combat. If host nation authorities are temporarily unable to assist, he can plan humanitarian assistance or even give complete assistance. Likewise, he can track the number of interned personnel to monitor their administration with the authorities who are responsible for their disposition.

The remaining columns reflect the significant but occasional requirements the S-1 may be called on to provide personnel service support for the brigade's soldiers. Thus, the Chaplain column relates to the Unit Ministry Teams (UMTs) required to maintain morale as well as the moral fiber of the brigade. During resupply and reorganization operations following intense combat, it may be necessary to call on all of the UMTs to conduct memorial and grief counseling services for a

particular unit. This situation would temporarily leave only a lay minister at the other units and this fact should become a highlight in the update of the brigade's personnel estimate.

Possible missions for the finance support team might be to refund unit Class A agents for local subsistence procurement or payment of locally hired labor, or to arrange for currency conversion when necessary. Finally, military police missions reflect the coordination needed for straggler control teams, speed checkpoints along the MSR, or the operation of law and order teams in the battalion areas.

Although medical support is classified with METL tasks, it can also be added to the PSS matrix, because it requires more attention than just tracking casualties. For simplicity, though, I prefer a separate matrix for medical support to emphasize its pivotal role in light infantry PSS planning. The columns might be headed Casualties, Treatment Team, and Bed Capacity, with the units listed down the side. (The Standard Integrated Command Post tent (SICP, for short) is issued with two collapsible map boards that easily accommodate a wide matrix or two separate matrices. In either case, a micro-computer using Harvard Graphics can easily produce an 8½ x 11 copy

of each matrix.)

As casualties are reported over the administrative/logistical radio net, the S-1 or S-4 clerks record the data in the staff log on a DA Form 1594. Casualties that arrive at the brigade support area (BSA) are assigned cots at the supporting medical company. With the capacity of the holding area shown on the matrix, the staff has a ready summary of the casualty situation without having to refer to the staff log.

The medical company commander normally provides a daily update of battle and non-battle injuries, and this data can also be transferred to the matrix. As the medical company updates the situation, the S-1 can readily display the scope of each battalion's casualty situation within the brigade combat trains command post. He can also cross-check the effectiveness of the casualty evacuation system. If too many casualties are being evacuated from the unit that is assigned the secondary effort, for example, the matrix will demonstrate shortcomings that may require attention.

For long range infiltration missions, the matrix offers the same functions. During such operations in rugged terrain, a main supply route may not be available. The air defense threat may limit the air evacuation of casualties to times of limited visibility. Treatment teams from the medical company may be attached to the battalions to provide stabilization. Cross referencing the stabilization capability of an augmented aid station against the casualty rate provides a means for planning emergency Class VIII resupply missions.

The advantages of this system to an undermanned staff section in a difficult situation are obvious. One or more matrices can be used to demonstrate key PSS activities visually. A matrix provides a simple briefing aid for shift changes at the combat trains command post. A traveling copy in a briefing book can be used for command and staff briefings at the brigade command post. In addition, the matrix can contain data to make a hasty personnel estimate and staff recommendation during the orders writing process.

In the final assessment, the matrix system may simplify the S-1's job of managing what could be a mass of data and enables the S-1 to provide the best possible care for soldiers under stressful conditions.

Major Walter A. Schrepel was S-1, 1st Brigade, 10th Mountain Division when he wrote this article. A U.S. Military Academy graduate, he has also served as a battalion S-1 and as a G-1 plans and operations officer.

# **The Battalion Chaplain**

LIEUTENANT COLONEL COLE C. KINGSEED

Chaplains have always played a vital role in providing for the spiritual welfare and the combat readiness of the U.S. soldier, and today's battalion chaplain

AUTHOR'S NOTE: I would like to acknowledge the assistance of Captain Michael Coffey, chaplain of the 4th Battalion, 87th Infantry, in writing this article.

continues that proud heritage. Not only is the chaplain an ordained member of the clergy and a commissioned staff officer, he is also an indispensable member of the chain of command and the unit ministry team.

The primary combat mission of the unit ministry team is to provide spiritual support to soldiers in combat. The chaplain, as a religious leader, points soldiers to the reality beyond themselves. In war and peace, he assists the commander by providing spiritual resources that will enable soldiers to strengthen their faith and achieve inner peace, stability, and a sense of tranquility.

On the basis of my observations during 20 years of commissioned service, I would like to offer a few suggestions and recommendations to aspiring junior leaders on how best to use their chaplains.

Most leaders are familiar with a chaplain's traditional duties. He routinely ministers to the soldiers and their families by offering a wide range of services—denominational and non-denominational services, visits to the sick, care for battle casualties, family and personal counseling of individual soldiers, and a host of other activities outlined in Army Regulation 165-1, Duties of Chaplains and Responsibilities of Commanders.

In addition to these duties, though, the chaplain also has a less traditional role. Let me offer a few insights to illustrate how he can influence and strengthen an infantry unit. These remarks are applicable to junior and senior officers and noncommissioned officers alike. For the sake of brevity, my remarks are limited to five general categories:

Command Relationship. The chaplain is the most important special staff officer in the command. In addition to fulfilling his normal staff functions, he is a commander's primary commissioned advisor in assessing the command climate in a unit-from battalion to squad level. But where is the chaplain's proper place in the overall command structure? How frequently should leaders see the chaplain? Is the frequency greater at battalion, company, or platoon level? Regardless of the frequency, the chaplain must have unlimited access to the commander. Anything less than open and candid dialogue is detrimental to the welfare of the command.

As a battalion commander, I spoke to the chaplain daily. We generally had a brief conversation at morning physical training or during a short visit to his office. Since he was the one the soldiers or their family members would see if problems arose that they did not want to discuss with the chain of command, I often used him as a sounding board to test my ideas. These conversations

were extremely beneficial; once the chaplain fully understood my goals, he could address the soldiers within the framework of my intent.

One of my colleagues gave his chaplain a list of questions about the battalion's attitude on an issue. The commander then gave the chaplain ample time to survey the appropriate audience and asked him to report his findings. The feedback was helpful and gave the commander an important tool for assessing the command climate.

The same commander also directed the chaplain to interview, immediately after adjudication, every soldier who received an Article 15. The intent was to give a soldier an opportunity to talk to someone outside his immediate chain of command. The chaplain not only ensured that the soldier had not lost his self esteem as a result of the nonjudicial action, but he also gave the commander immediate feedback as to the soldier's perception of the justice of the proceedings. The commander then conveyed this information through noncommissioned officer channels so the soldier's squad leader could work effectively with him.

Establishing a vibrant commanderchaplain relationship is not solely the responsibility of the battalion commander. Company commanders and first sergeants, as well as platoon and squad leaders, also need to establish a positive relationship with the chaplain. (Unfortunately, the chaplain is the one who frequently must take the initiative and seek out company leaders.) Junior officers and noncommissioned officers who fail to use the chaplain effectively miss a good opportunity to build unit cohesion.

A good rule of thumb is to have the chaplain make an office call soon after a new commander or first sergeant joins a company. The chaplain can use this forum to explain how he can help those leaders accomplish their missions. A successful chaplain seldom bypasses the company chain of command. He never demands; he generally suggests. As a result, immediate trust can be established between the company leaders and the chaplain. Whenever this relationship

becomes strained, as it sometimes does, both parties must seek an immediate reconciliation. If they do not, the soldiers are the ones who suffer.

Tactical Duties. Field Manual 16-1 is an excellent reference for explaining the chaplain's role in a tactical environment. Essentially, soldiers want to see their chaplain in the field, particularly during hazardous training. The chaplain provides a degree of security for the soldiers, who take solace knowing one of "God's own" is with them. Moreover, soldiers traditionally make the extra effort, go the additional mile, when a chaplain is at their side sharing their ordeal.

In the field, the chaplain makes his greatest contribution by visiting soldiers and sharing their hardships. Although a chaplain is not authorized a vehicle in light infantry units, a prudent commander makes sure the chaplain has access to some type of transportation. My chaplain had little difficulty making his rounds throughout the command, often catching a ride on a mess truck or a support vehicle. Visiting every soldier in his individual position, the chaplain spent a day with each company before going on to the next. At night, he and his assistant constructed their own fighting position near a company headquarters so they could keep abreast of the tactical situation. Naturally, in actual combat he would be ministering to the sick and wounded, but the only time I ever saw my chaplain during a field training exercise was when I inspected one of the companies. His place was not with a headquarters but was with the men, and the effect on morale was enormous.

There is no rule that says the chaplain participates only in battalion level exercises. Since the entire battalion deploys to the field, soldiers expect to see him on battalion training exercises. But the strongest bonds form when the chaplain also trains and visits the soldiers during platoon and company level field training where a battalion leader's attendance is strictly voluntary. By offering encouraging words, sharing the soldiers' concerns and needs, joining in prayer and administering blessings,

the chaplain soon becomes the most popular officer in the battalion.

Influencing Morale. Combat veterans know full well the positive influence a chaplain has on unit morale, and few at any level would go into combat again without one. Leaders should therefore encourage the chaplain to spend as much time as possible with the soldiers. Although he is a commissioned officer, his place, more than that of any other officer, is with the soldiers.

The most effective chaplains are those who plan their personal schedules to ensure as much contact with the troops as possible. By scheduling counseling sessions in the afternoon, for example, a chaplain can take part in morning training. This scheduling technique serves two purposes: First, it gives the chaplain increased visibility and accessibility to the soldiers ("palm tree counseling," as my chaplain in Hawaii called it). Second, the men frequently give informal feedback to the chaplain on a wide range of issues, not the least of which is unit morale.

The chaplain should not be the only leader who benefits from a soldier's response. The next step is for him to share his concerns with the company leaders. Any time a commander follows a soldier's suggestion and alters training (using three crew served weapons at an EIB test site instead of one, for example, to give more soldiers an opportunity to conduct hands-on training) or adopts a spouse's recommendation (such as publishing a training calendar in the monthly newsletter), he sends a clear message to the soldiers: The command cares about you, your family, and your ideas. A commander knows the chaplain is successful when the soldiers begin referring to him as "their" chaplain, rather than as "the battalion chaplain."

Building Unit Cohesion. The chaplain also plays a pivotal role in creating a sense of community and esprit de corps among the soldiers, their families, and the command. What is the best method of achieving the sense of organizational and communal pride? I found that having numerous social events, at little or no cost to the families, was extremely effective. Organizational days, family religious retreats, holiday meals in the dining facility, and company parties all helped create a sense of battalion unity. Chaplains also have special funds available for sponsoring such activities.

By far the two most effective functions organized with the chaplain's assistance were a battalion formal dining out for the soldiers and their wives and an allranks family retreat at one of the local recreation areas. These annual events created camaraderie, traditions, and special memories for the soldiers and their families. In many cases, the dining out and the retreat were the first opportunities for the wives to participate in a battalion activity. The battalion had a good response to both functions, and they are now annual events.

The unit cohesion created by activities of this nature pays huge dividends when it is time to organize family support groups, which are critical in ensuring that family members receive proper care. Spouses who feel that the command cares for them and that they are an integral part of the organization are far more willing to assist others in the platoon and company.

Pre-deployment Briefings. Another important contribution a chaplain makes to the combat effectiveness of a unit is preparing the soldiers and their families for the trials of separation. Predeployment briefings are a commander's responsibility, of course, but the chaplain can advise him on a number of topics. Most chaplains are accomplished speakers and know more about audience analysis, family group logistics, and soldier needs than any other staff officer, and his recommendations ought to carry more weight. Too, since the chaplain has had years of experience recruiting family volunteers and organizing parish activities, the commander should consult him about child care, scheduling, refreshment needs, and related issues.

In advising me on issues related to deployment, my chaplain offered several important recommendations that greatly contributed to the success of the briefings. His most important recommendations included scheduling and reviewing what each speaker intended

to say, particularly volunteer speakers from outside the battalion. As a result, the battalion never scheduled a briefing before 1900 hours so the families had time to eat their evening meal together and arrange for baby-sitters where appropriate. The chaplain also carefully reviewed the comments of every speaker outside the immediate chain of command, such as representatives from the Red Cross, Military Police, and Army Community Service. The intent was not to censor a speaker's remarks but to ensure that no one inadvertently caused a family member undue concern for his or her own safety once the soldiers deployed.

Above all, the chaplain must be given time on the agenda to address the families and summarize the facilities that will be available to them as they cope with the rigors of separation. The chaplain can also outline the religious activities available to the families during the time the soldiers will be deployed. This procedure will have a calming effect on the wives, many of whom are being separated from their husbands for the first time.

In summary, the chaplain is an indispensable link between a leader, the soldiers, and the soldiers' families. A good chaplain will significantly improve the morale and cohesion of a unit. He is a valuable asset and all leaders should readily use him. Leaders who take advantage of the skills and techniques the chaplain offers always have stronger organizations than those who do not.

One final word is in order. The chief of the battalion's ministry team is not just the battalion chaplain, he is also the company, platoon, and individual soldier's chaplain. He truly belongs to the soldiers, not the battalion. With a few notable exceptions, no individual contributes more to instilling pride in the organization and improving the combat effectiveness of a command.

Lieutenant Colonel Cole C. Kingseed previously commanded the 4th Battalion, 87th Infantry, 25th Infantry Division, and is now attending the Naval War College before joining the faculty of the United States Military Academy. He is a 1971 ROTC graduate of the University of Dayton and holds a doctorate from Ohio State University.

# The Synchronization Of the Brigade Fight

COLONEL BRUCE B.G. CLARKE CAPTAIN STEVEN S. KLEMENT

Much has been written in the past few years about synchronization. Many authors have tried to define what it is and what it consists of, but few have talked about how to achieve it.

Members of the staff of the 2d Brigade, lst Infantry Division, have developed and tested one method of synchronizing the battle. It includes a synchronization matrix that we have found useful, and also a process that the staff goes through in developing and refining their orders to their subordinates. In this process, the commander's intent, as elaborated in terms of the anticipated enemy activity and the seven battlefield operating systems, provides the basis for the synchronization of the battle.

The commander's intent is his visualization of the unfolding battle — the options that he thinks may be available, when and where they may be available, or what will be necessary to make them available. His ultimate goal is to achieve mass at the critical time and place, because it is timing that allows the combat multipliers to be brought together at the critical juncture on the battlefield. At the brigade level and lower, timing is the key.

The synchronization matrix we developed is prepared in additon to the normal order, which includes overlays and annexes. The matrix does not have a decision support matrix, but in fact captures in more complete form the wargamed results of the decision support template. It may even be called a sophisticated kind of decision support template. In some cases, it is similar to a table of contents for the specific annexes, because it refers to details in them.

The key is that in developing the matrix, the staff actually wargames actions. The wargaming synchronizes the battle by determining the critical times when certain assets need to be used in certain ways and at specific points on the battlefield to accomplish the commander's intent. Wargaming requires the staff to consider the time and distance factors involved in synchronizing the battle and to work them into the final product.

Across the top of the matrix (Figure 1) are blocks for the corps, division, and brigade commanders' intent, which gives each the appropriate visibility and focuses the unit effort.

In the next line down is the event/

phase section. Here, we show enemy and friendly activity in sketch form and highlight critical graphics such as decision points that are also on the operations overlay. Along the bottom of these blocks is a box for the estimated time of each event or phase. In this section, we break the battle into bite-sized pieces by event or time, or both. This allows us to plan in detail for each bite by picturing the situation that must be created or dealt with. This includes stated and implied tasks and different options.

The third part of the matrix contains the seven battlefield operating systems arranged so that entries can be made for each event or phase (Figure 2). Included are reminders of the critical items that need to be considered and dealt with. Finally, the last line on the matrix is used to highlight other critical information (Figure 3).

The actual matrix is about 2.5 feet by 3.5 feet and can be copied on a diazo machine, which makes field reproduction much easier than normal annexes.

Once the brigade has been given a mission, the staff begins its intelligence preparation of the battlefield (IPB). In this analysis, the S-2 must not only

CORPS COR'S INTENT			DIVISION COR	S INTENT		BRIGADE MIS	SION		BRIGADE COR'S	NTENT	
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ENEMY SITUATION COURSE OF ACTION											
PROCEST PORTS.											
PAUSE LINES TAI MAIS					]					_	
ENGAGEMENT AREAS OBJECTIVES EST TIME			-			 		-		-	

Figure 1

analyze the terrain and the weather but also must start to depict the enemy's possible and probable courses of action. These courses of action need to be shown on a map and also in sketches on the synchronization matrix.

In this layout, the S-2 templates the enemy's size and formations, if they are not known, and depicts the possible phasing of the enemy's activity and his decision points. This layout allows the commander to explain the way he

CORPS	CDR'S INT	ENT		
EVENT/	PHASE			
ENEMY SITUA	TION COURSE O	F ACTION		
TRIGGER POINT FRIENDLY DE PHASE LIMES TAI-NAIS ENGAGEMEN OBJECTIVES	CISION POINTS	☆ EST TIME		
	ASSETS	ORPERAFI		
	GSA 5 LP/OP'S			1
INITES	LRSD			
INTEL	PATROL S SCOUTS			-
	REQUESTS	COR S PIR		
	TO DIVISION	EW LFFORT		
	CONSIDERA - TIONS:			
	DEEP			
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MNVR	CLOSE			
	RESERVE COUNTER-			_
	RECON			1
		FA (DS)		
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		TF MONT CONTROL MEAS PRIORITY UF		
FIRES		FIRE		
		TGT GROUPS EAS		
		FASCAM		
		CAS		
		ATK HELD		
	PRIORITY	PROTECTION		
ADA			1	1
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c <sup>2</sup>		MAIN CP	1	
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		ALOC		
		MSR 3		
CSS		PONOTIES.	-	
		MAINT MEDICAL SUPPLY REPLACEMENTS		
		REPLACEMENTS	_r	
COC	ORDINATING I	NSTRUCTIONS:		
STA	ND TO: (DTG	1		

Figure 2

envisions using his assets sequentially and, when appropriate, massing them during each phase of the battle to defeat the enemy. The commander is thus attacking the enemy's plan, and in so doing is ideally attacking it at points where he sees flaws or weaknesses.

The next step is to begin determining the required intelligence. The commander's priority intelligence requirements (PIRs) will be based on what is not currently known and on what the enemy's decision points are believed to be. The S-2 normally has about a tenpercent knowledge of the enemy and templates the other 90 percent, but it is much easier to confirm a template than to go out and collect intelligence at random.

In other words, the first phase of any operation is intelligence gathering, which needs to be simultaneous with the completion of the staff's planning. The S-2 must immediately begin gathering information and confirming or denying the template, using whatever assets are available. These vary with the level of command but may include long range surveillance detachments, electronic intelligence assets, ground surveillance radar, air cavalry, ground cavalry, a battalion scout platoon, or a company reconnaissance patrol. In the end, as the plan comes together, the goal is to have all of these performing in a synchronized manner, backing each other up.

During the IPB process, the intelligence officer also lays out the enemy's courses of action in terms of time. This allows him to determine whether the enemy has the time, or whether he can take certain actions to create the time, to pursue other options. Once the enemy has been templated and at least his primary courses of action laid out, the commander can then, and only then, start developing his intent and scheme of maneuver for carrying it out.

His intent needs to explain how he plans to overcome that enemy — how he plans to maneuver, where and when he wants to mass, what he needs to do to cause the enemy to be at the place where he wants to mass, how he plans to conduct a deep fight, how he will

conduct his counter-reconnaissance and security missions, and how he will react to the enemy's decisions or actions at different decision points. These considerations, in turn, will lead the commander to plan fires that support and improve upon each portion of the resulting scheme of maneuver.

At this point, it is most critical that the fire support planner and the maneuver planner work together closely. At the brigade level, the commander not only has to worry about moving the artillery so it can support his maneuver, he also needs to establish priorities for targets and fires. In a 30-minute battle, an artillery battalion will be able to fire only three or four missions of 72 rounds each. The commander must therefore determine the three or four most critical fire missions and then make sure they reinforce his vision of the maneuver fight. One technique for doing this is to develop a sequence of fires that complements the scheme of maneuver and that is written in similar timelines.

While considering fires, a planner also needs to determine whether attack helicopters are available and when and where they will be used so that they can be coordinated with artillery and close air support (CAS). The suppression of enemy air defenses (SEAD) also needs to be incorporated into the sequence of fires when CAS or attack helicopters are used. Obviously, timing is critical in this process.

In addition, the electronic warfare and other combat multipliers might be used if they are available. All of this would be shown as simple matrix entries that, in turn, would serve as warning orders to the subordinate units.

Obviously, our own air defense artillery needs to be incorporated into the plan and must be positioned to protect our critical assets, for either the current phase or a subsequent one. In this regard, too, the air defender may be the best source of information the commander has on the actual conduct of the battle. Sitting on the flanks (and sometimes above the battle at the NTC), he can see not only friendly units but enemy units as well and can report the activity he observes.

### Figure 3

In the planning process, the employment of engineers — priority of effort, mobility, countermobility, and survivability — needs to be considered. Smoke and decontamination sites also must be considered, and these need to be readily apparent to subordinate units and coordinated with the rest of the plan. Related to this, the commander should anticipate when and where the enemy might use chemical weapons so he can direct the proper levels of MOPP (mission oriented protective posture) at the proper time or in the proper situation. Each of these should then be depicted, by phase, in the matrix.

While sequencing and synchronizing fire, maneuver, air defense, and engineer assets, the staff also needs to synchronize the movement of command and control elements. There are many examples of units that have ended up with all their command posts on the road at one time, which has resulted in the loss, or at least the reduction, of command and control.

Finally, none of these things can happen if the staff has not also planned for, moved, and positioned the combat service support (CSS) assets — fuel and ammunition and whatever else is needed — to support the battle. In fact, the positioning of CSS in both space and time may be a critical part of the commander's vision.

In this process of thinking through and organizing the information displayed on the synchronization matrix, a continual wargaming occurs among the staff members. The following example will help explain the way the matrix is developed and the wargaming involved:

During one warfighter exercise, the brigade was tasked to act as the division reserve and had two mechanized infantry battalions and one armor battalion for the mission. It was given seven different contingency plans that it might have to execute. The first step in trying to plan in detail for each of these contingencies was to template the enemy. What kind of enemy would we probably fight, and where could we expect him to be?

To answer these questions, the brigade S-2 templated the enemy on a map and then diagramed on the matrix the enemy's most likely formation. If he or the division G-2 thought we would be fighting the remnants of a regiment, he used a partial regimental symbol. This allowed us to synchronize our battalions' movements and to show the battle or defensive positions they would occupy to counter the anticipated enemy plan.

We showed the enemy and friendly phases of the operation and eventually added our own plans by drawing sketches of the entire sequence of maneuver. These sketches conveyed to the battalion commanders precisely what the brigade commander's intent was and also gave us a focus on the enemy. Because we had templated an enemy force, we could ask the division to focus its resources on confirming the presence of that force, not only its location but also its dispositon and strength.

By breaking the battle down into finite phases and then wargaming our way through each little event that had to occur in each phase, we were able to give instructions to the subordinate units in a synchronized, time-related manner. They, in turn, were able to take each of these phases and embellish it, adding the specific subtasks they had

to perform and the subordinate commander's intent. The synchronization that began at brigade level thus flowed, through expansion and increased detail in the orders process, all the way down to company level.

This process — the wargaming and the preparation of the plan, coupled with rehearsals and refinements as the enemy situation becomes clearer enables us to have all of the appropriate action agents prepared to execute the commander's intent. The matrix is perfect to use in conducting a rehearsal, because it lays out all the small pieces and allows a commander to work with each of the critical players to make sure he understands what he must do and when.

None of this is to argue that any battle will unfold precisely as a staff has envisioned it. The enemy will not necessarily be configured precisely as he has been templated. If enough time is available, a set of matrix entries can be developed for each of the enemy's other options, but only after the staff has planned to deal with the most likely one. The staff can then work through those other options from the most likely to the least likely.

Even if the enemy does not do what the staff members have anticipated, they still have a basic battle plan that can be modified to fit the existing situation. There is no need to start over and build a whole new plan, and this makes synchronizing the actual battle much easier. The commander and the XO always work together to ensure that the staff continues to execute those portions of the plan that have not been changed, and the momentum is maintained. The



XO in the TOC and the commander forward at the critical spot on the battlefield can thus fight a synchronized battle. Since the XO has most of the battle staff in the TOC, he is the one who must ensure that the commander's intent is achieved — that synchronization has occurred.

If it sounds like we think this matrix development process, and the resultant wargaming, is a cure-all, we do not. To make it effective, we spent several months developing and refining the matrix and five months training in its use. (AUTHOR'S NOTE: Major Steve Bourque translated an idea into the matrix. Captains Stewart Smith, Scott Rutter, and Pete Scheets and the rest of the briqade staff, under the direction of executive officer Lieutenant Colonel Don Schenk, contributed to making the matrix concept meaningful.)

The next step in our learning process will be to make the matrix a living document. To do this, we will have to learn to do a better job of predicting where the battle will turn — when it will go in a direction we have not anticipated. We will then need to "cut" the matrix and start planning. Given

the size of the brigade staff, doing this while fighting the brigade fight will be difficult, but until we have tried we won't know whether we can do it. If we do master such a process, it will either supplement or replace the standard fragmentary order.

Meanwhile, we have tested this synchronization matrix process at the National Training Center and have found it effective. It is probably most effective at the NTC because of the doctrinal approaches the opposing force follows. Rarely has the staff failed at least to consider most OPFOR options. In each case where we determined the enemy's decision points, and therefore which course of action we would adopt if he made a certain decision, we found this method effective. We moved our forces on the basis of the time and distance factors and the decision points in the matrix, and these moves resulted from the fact that the enemy actually performed as we had templated and predicted.

Additionally, artillery was moved and sequences were fired entirely on the basis of the wargaming and the times entered on the synchronization matrix. This was done along with closely coordinating our air support, attack helicopter, and electronic warfare assets. In several instances, the brigade was able to fight the deep fight and then reposition the artillery so that it was prepared for the close-in fight. The hand-off of the battle to the forward battalions also took place as planned and as depicted in the matrix.

Obviously, the key part of any battle is seizing or maintaining the momentum so as to destroy the enemy, and this process allows us to do that. It may not work for every unit, but we believe it is at least worthy of consideration.

Colonel Bruce B.G. Clarke commanded the 2d Brigade, 1st Infantry Division when this article was prepared. Commissioned in Armor branch from the United States Military Academy in 1965, he now serves as an instructor at the Army War College.

Captain Steven S. Klement was assistant S-3 of the 2d Brigade, 1st Infantry Division when this article was prepared. He was commissioned in Armor from the United States Military Academy in 1985 and served as platoon leader, battalion assistant S-3, and armor company executive officer with 4th Battalion, 66th Armor in Germany.

## **Individual Protection Kit**

LIEUTENANT KEVIN M. WALKER

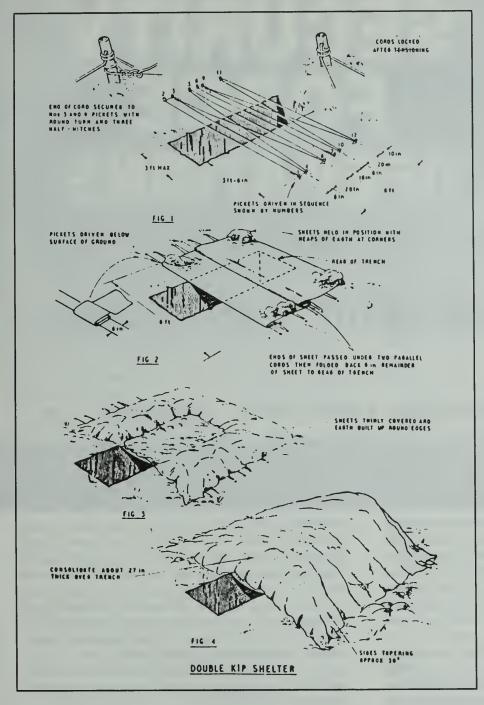
During a two-week training period in 1987, units of the 2d Battalion, 293d Infantry, Indiana Army National Guard, and the British 6th Battalion, Royal Anglican Regiment, Territorial Army, conducted an exchange program to promote inter-allied cooperation and understanding.

A reinforced British company plus scout (recce) platoon was sent to a U.S. reserve forces training area in Indiana, while one rifle company of the National Guard battalion was sent to the United Kingdom. The exchanged units replaced each other in their parent battalions, assuming control of the units' organic equipment and weapons. The men of each company retained their individual organizational item issues ("TA-50" in U.S. jargon).

One item of British equipment that gained our interest was the KIP (kit,

individual protection), a lightweight support system for providing overhead cover for an individual fighting position. The kit enables a British soldier to erect effective overhead cover rapidly without logs or engineer support, and in less time. It comes sealed in a pouch smaller than an MRE (meal, ready to eat) and is issued on the basis of one per man.

With the present emphasis on light, mobile, self-sustaining units, the intro-



duction of the KIP or a modified version of it into our Army would give U.S. infantrymen increased protection with an almost negligible increase in their fighting loads.

The KIP is composed of a strong lightweight tarpaulin, six hollow alloy stakes, and a nylon suspension cord. These three items are issued in a doublewrapped plastic pouch that measures 13½ by 5 by 8 inches and weighs 1 pound 15 ounces. The kit is emplaced over a fighting position and backfilled to form a hump on the ground.

Installation is fast and simple:

· Drive stakes into the berm on each



side of a fighting position (along the position's long axis).

- · Lace the suspension cord through the stakes and secure with the cord pulled taut.
- Place the tarp over the suspension system allowing the tarp's front edge to be tucked under.
- Backfill around the edges of the tarp to a depth of 18 inches.
- · Backfill to cover the remaining tarp to a compacted depth of 18 inches.

Two men act as a team to build either a single or a double cover. A trained and experienced team can emplace a cover over a two-man fighting position in 15 to 20 minutes. (The accompanying sketch, taken from the British kit, shows dimensions and instructions for installing a double shelter.) The kit can also be used for a shelter, a litter, or a protective covering.

The KIP would offer the following advantages over our current system:

- Decrease the time needed to emplace overhead cover.
- Decrease logistical and engineer support requirements, freeing the engineers to perform mobility, countermobility, and other higher priority missons.
- · Eliminate the need for logs and timbers as a key element of overhead cover, especially during operations in the desert or tundra where the procurement and transportation of such materials would strain an already overburdened logistical support system.

We now have a real need for a system such as this, and its benefits would far outweigh the relatively minor cost of procuring it. Available, off-the-shelf or readily modifiable low technology can save lives, too!

Lieutenant Kevin M. Walker was a rifle platoon leader in the 2d Battalion, 293d Infantry, during the exchange program. He is now assigned to the 27th Brigade, New York Army National Guard, the round-out brigade for the 10th Mountain Division (Light Infantry). He is an ROTC graduate of Purdue University.

# SECURITY FORCE DEFRACIONS INFANTRY TASK FORCE CAPTAIN EDWARD G. GIBBONS, JR.

A security force for a defending mechanized infantry task force performs a grueling, critical mission — a mission that can mean the difference between victory and defeat. Unfortunately, there is a curious lack of doctrinal guidance on the subject in Field Manuals 71-1 and 71-2. In the absence of such guidance, the ideas offered here may help future company team and battalion task force commanders plan and conduct security force operations.

In designating a security force for a defending mechanized infantry task force, a commander must keep in mind that its main function is to guard the task force's main battle area (MBA) to prevent enemy ground observation of the MBA units and direct fire against them. Within its ability to accomplish its primary mission, a guard force also must be prepared to conduct combat operations. These can include reconnaissance, attack, defend, and delay missions, usually within range of the main body's indirect fire weapons.

It is important to note that the force's primary focus is on enemy reconnaissance elements; it focuses on the enemy's main body only within the conditions established by the task force commander. If a security force is successful, it will destroy the eyes of an attacking commander and deny him knowledge that is vital to the success of his attack.

Because the attacker's reconnaissance forces must give

their commander early warning, his divisional long range reconnaissance units may precede his main body by up to 100 kilometers, with the other elements up to 50 kilometers in advance. The regimental teams may be up to 25 kilometers ahead, and can be closer once contact has been made. Long range teams may begin to penetrate the forward edge of the battle area two or more nights before the lead echelon arrives, or they may already be in place on the night before an attack, supplemented by regimental teams. With a large number of dismounted infantry soldiers available, a dismounted night attack by part of this force is also a distinct possibility.

The organization of the security force must therefore be tailored to defeat all of these enemy reconnaissance units and to carry out subsequent missions as an integral part of the task force's main battle area (MBA) defense.

Recommended organizations for task forces equipped with Ml tanks and M2 Bradley fighting vehicles (BFVs) as well as Ml tanks and M113 personnel carriers are shown in the accompanying box. A force so organized can fulfill its assigned task of guarding the MBA, as it is capable of reconnaissance, defense, or attack, is relatively self sustaining, and can operate semi-independently while denying the enemy direct observation and fire against the

### TASK ORGANIZATION

M1/M2

Tank Team Headquarters
2 Tank Platoons
1 BFV Platoon
Scout Platoon (HMMWV)
Mortar Section
GSR Section
Stinger Team
FIST-V (Team

Headquarters)

MI/M113

Tank Team Headquarters
2 Tank Platoons
1 Mechanized Platoon
Scout Platoon (HMMWV)
Antitank (TOW) Platoon
Mortar Section
GSR Section
Stinger Team
FIST-V (Team Headquarters)

task force. A larger force would probably be too much for one commander to command and control. And a smaller one, possibly an ad hoc force, could not be expected to successfully execute its security mission with its attendant sub-unit missions, because it would have serious shortcomings in command and control, combat support, and combat service support.

Because time is absolutely critical to a security force, such a force must be constituted rapidly when the task force receives the warning order to go over to the defense. Any element that is not already either attached to the team or under its operational control should receive top priority in the cross attachment process so that the team commander can begin his troop leading procedures.

A warning order is issued with a place and time for all elements to assemble, and the security force commander confers immediately with the S-2 and S-3 regarding the task force security force area, the threat, the main battle area, engagement criteria, avenues of approach, and named areas of interest (NAIs). In addition, a line is designated for the handoff of the battle from the security force to the MBA units, along with an effective time. This usually becomes effective at EENT (end evening nautical twilight) of the same night and serves as a restrictive fire line for both the security force and the MBA units.

While platoon sergeants prepare the troops and equipment for the upcoming night's battle, the platoon leaders move out with the commander in their combat vehicles to conduct a thorough reconnaissance of the security force area. At this time, templated avenues of approach are confirmed, and others are identified. Both mounted and dismounted avenues are identified, with particular attention being paid to the flanks and boundaries. Target reference points (TRPs) are marked and thermal devices added. Hide and fire positions are confirmed as well as routes of occupation, withdrawal, attack, and control measures for the passage of lines.

Following the reconnaissance, the commander and platoon leaders return to the assembly area. Operations orders are issued, face-to-face coordination is conducted by the sub-elements, all TRP and vehicle locations are updated, and graphics are issued down to the squad and crew level.

Except for the scout observation posts (OPs), which should

have immediately moved out after the warning order, the security force must occupy its area before the time specified in the task force's fragmentary order. Every effort should be made to conceal this move so that an enemy unit that may have the security force under observation will not have much time to identify the force's locations and plan accordingly.

The occupation time that is set must give the crews enough time to prepare range cards and sector sketches and to conduct a thermal rehearsal with their night sights. The terrain's thermal image can then be interpreted against its actual visual appearance, and thermal TRPs can be integrated into the range cards. This technique greatly increases the accuracy of any grid locations derived from a thermal observation of the battlefield.

Since the security force must be capable of sustained operations forward of the MBA, it must also be as self-sufficient as possible. If the team is to succeed in its efforts to refuel, rearm, and reconstitute losses, the company trains must be present under the team first sergeant. The first sergeant is fully integrated into the planning and execution of the combat service support (CSS) plan. This plan specifies casualty collection points, and the platoon recovers vehicle and personnel casualties to these locations. Each member of the team must know where they are, as well as the route the first sergeant will use to and from each point. From there, the first sergeant will take the casualties to the task force jump aid station or jump unit maintenance collection point (UMCP).

The task force can take specific steps that will greatly assist the security force. Serious consideration should be given to positioning the jump aid station and jump UMCP forward during the security force battle phase of the defense. These assets should be masked from ground observation, but should still be as close as possible to the security force's rear boundary. This will increase the survival rate among wounded soldiers and the return rate of damaged vehicles, as well as keeping the team's organic assets available to deal with casualties as they occur. Forward units may also provide recovery and casualty evacuation elements, since generally they will not be engaged during the security force battle

Above all, the task force as a whole must keep in mind that during security operations, the security force must be the number one priority if it is to succeed and enable the other units to prepare their defenses unobserved and unimpeded. An ad hoc force, without the organic trains element, will not be able to sustain the pace of operations that a security force requires, or the casualties that can be expected.

In the most likely scenario, a security force can expect to encounter one of several small incursions by one or two vehicles along difficult routes, especially at the boundaries between units where coordination is habitually poor. A sample array of the security force is shown here that seeks in several different ways to counter this threat. The security

force is made up of "listeners" and "lookers" for target acquisition, and "shooters" for target engagement:

First, the listeners are positioned along the forward boundary (usually the line where the battle is handed off from the brigade or other element); in most instances a vehicle is heard at night rather than seen as the first target acquisition. For this reason, the dismounted scout OPs and infantry squads are emplaced in concealed locations along restrictive entrances to the security force area.

The mechanized squads from the BFV platoon are usually employed along the flanks, but in any case along infantry avenues of approach to provide early warning and to conduct patrols. They can also execute limited antiarmor and antipersonnel ambushes to eliminate penetrations by single vehicles or small dismounted patrols.

These are not hard and fast rules but guidelines that capitalize on the capabilities of a small, concealed OP at night. The listeners can hear a vehicle from a great distance as well as cover terrain that is unsuitable for long range observation. It is important for them to be placed well away from mounted elements so that friendly engine noise does not prevent them from hearing the enemy.

Second, the lookers are provided with fields of observation and fire that overlap throughout the width and depth of the sector. The true lookers of the force are the infantry platoon's BFVs or the antitank platoon's improved TOW vehicles (ITVs) and the fire support vehicle (FIST-V). These can be supplemented or replaced by the scout platoon's BFV, if it is so equipped. Further assistance is provided by the commander's and the executive officer's vehicles.

The lookers, by way of the TRPs, are assigned overlapping primary and alternate sectors of observation. In this way, the commander has continuous and flexible coverage that allows him to see and hear the entire battlefield. The tanks

are assigned sectors that supplement those of the lookers to their front, from which they can then acquire and eliminate any reconnaissance elements that manage to evade the forward elements. This is especially helpful when there are multiple avenues of approach through compartmented terrain.

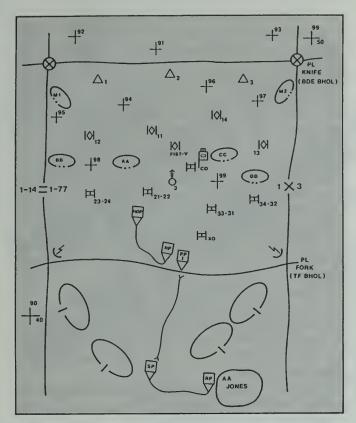
All of the thermal lookers are supplemented by the ground surveillance radars (GSRs). In open terrain such as a desert, with their planning range of 10 kilometers, the GSRs can be placed well back in the depth of the sector while still ranging out to the battle handoff line, and possibly beyond, to help localize and refine a target that has been acquired by other means.

Finally, along with the listeners and lookers, the shooters consist of the tanks supported by the mortars and the artillery. From their location two to three kilometers to the rear of the lookers, the shooters can see the gaps between them and are close enough to provide a quick response to a target acquisition. At the same time, their placement to the rear of the lookers allows them to reacquire targets that may have eluded the lookers.

The tanks are the mobile killers of the security force. Once a target is acquired and identified, a tank or tank section should be dispatched to localize and destroy the enemy. Other tanks from the company can also patrol a flank or boundary to seek out a vehicle that may not have been acquired but is either suspected or templated.

Friendly casualties are an inherent danger in any night engagement, but this danger can be reduced. The first and most important item is a thermal rehearsal to familiarize every element with the location and signature of the friendly forces in relation to the terrain. Second, in this scenario, only the tanks move and only the tanks shoot. Since the friendly units are stationary, and the enemy is generally





moving, the tanks are less likely to engage a friendly unit, especially with the reenforcement provided by the thermal rehearsal. And because the BFVs and ITVs do not shoot, the tanks are also safe from them.

If the task force commander specifies it and if the IPB (intelligence preparation of the battlefield) process indicates the possibility, the next encounter could pit the security force against a large dismounted infantry force. This force will attempt to infiltrate in small groups or move in large elements to acquire intelligence, seize key terrain to help the main attack, destroy the security force, and breach obstacles in its zone. It is therefore critical for the security force to spot this enemy force as soon as possible and engage it with mortars and artillery.

Friendly dismounted elements should hide to survive and update the commander with spot reports. The lookers relocate, if necessary, to keep from being destroyed. If the enemy infantrymen are not killed by the combined mortar and artillery fire, it may be necessary to attack them with a portion of the tanks or even with the BFVs and their chain guns. The important point is that this force is dangerous and the security force commander should fight to the limit of his ability to protect the MBA as well as to preserve his own force.

Once the night battle is over, and assuming it has been successful, the security force commander has several things to consider. First, his force must be integrated into the task force's MBA scheme of maneuver. Second, while preparing for this mission, he must institute a rest and resupply plan and keep enough assets forward to continue his security mission.

One idea is to make this force the task force reserve. Since the security force at some point will terminate its guard force mission and conduct a rearward passage of lines into the MBA, usually to an assembly area, this mission makes sense. The force can then counterattack from this same assembly area in any manner the task force commander chooses, and the requisite planning, reconnaissance, and rehearsals can be conducted during the day when the threat is reduced by the increased alertness of the task force, as well as by the enemy's usual desire to penetrate at night. Whatever the plan, it is important to realize that the security force is in no way a "write-off" and that there will be ample opportunity to use its considerable combat power in the MBA defensive plan.

The security force performs such routine tasks as boresighting, maintenance, refueling, and rearming in increments. It rehearses passage of lines, as well as portions of the ground tactical plan. While this is in progress, the scout platoon leader can be placed in charge of the security force forward of the battle handoff line, with enough assets to be able to listen, look, and kill. Following this daylight phase, the security force is once again ready for another night of battle.

The security force's final task is to disengage and hand the battle off to the task force MBA units. All of the usual preparations for a rearward passage of lines are made and coordinated among the various task force elements.

The security force is generally given two criteria for withdrawal. First, the task force commander specifies a certain level of force destruction that triggers the return of the security force. Second, he states a time when the security force must have all of its component parts in place for the task force's main battle.

### PHASED WITHDRAWAL

When either of these two criteria have been met, the security force commander begins a phased withdrawal of his forces. The scout OPs and the GSRs can be left in place to provide early warning of the approach of the enemy's main body; if not, they are repositioned by the S-2 at this time. The team XO moves to the contact point, and the scout platoon leader moves to the redeployment point (RDP).

The first element to move to the RDP is the team trains element, followed by the infantry platoon. At the RDP, it moves into a column formation and prepares to move through the passage lane. The next element is the antitank platoon (if one is used), followed in order by the mortars, the team headquarters, and then the tanks, one platoon at a time.

In an average sector, this process takes about two hours, and the commander must plan accordingly. The scout platoon leader helps units find the RDP, orients them on the route to the passage point, and keeps the team commander informed of their arrival at and departure from the RDP. The XO performs the same actions at the passage

point and coordinates with the stationary unit representative. The team XO remains in place at the passage point until the last element has completed the passage. The units then make their way to the release point and on to the assembly area or battle position as specified in the ground tactical

Because a passage of lines operation has many inherent dangers and opportunities for mistakes, it should be planned and executed to the same level of detail as the fight itself. If the passage operation does not succeed, the task force commander may be robbed of a significant portion of his combat power just when he is about to engage the main enemy force.

In fighting the security force battle along these lines at the NTC, some units have quickly encountered several command and control issues. In these units, one solution was to have all elements controlled on the force's command net, which was "red." Although it required training to conduct operations in this manner, it paid big dividends in that it increased the speed of and actually decreased the number of radio transmissions. The value of this technique was illustrated time and again and was the single most valuable lesson learned in command and control.

When a spot report was generated by the scouts, for example, the commander did not have to call the BFV or 1TV to ask one of them to orient on the suspected location for a visual sighting. Since the Bradley commander could hear the transmission from the scout, he automatically sought the target and informed the commander (and thus every other unit) either of the target grid or of the fact that he could not acquire it. This was true for all the other elements, which either sought the target (if it was in their assigned sectors) or adjusted their sectors (to account for the vehicle that was now tracking the target). The commander could adjust coverage with a quick fragmentary order if he had a specific purpose in mind, and all of the units could hear it simultaneously.

Additionally, the security force commander could call any station immediately, get a radio check "in sequence" (have the force call off in order), and generally be aware of the team's alertness. This integration was arrived at only by thorough training, but once attained, it was very effective.

Soldiers who keep transmissions short, know how to send a spot report — using only SALUTE (size, activity, location, unit, time, and equipment) or the shorter SALT — and

are disciplined will adapt quickly to this system.

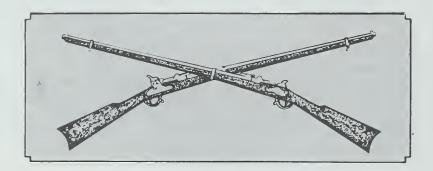
Another command and control issue is the security force's relationships with the task force tactical operations center (TOC). The TOC and the night battle captain must be aggressive and help the security force commander by actively seeking information from higher headquarters and passing information back to him. OH-58D helicopters, military intelligence, and other assets under brigade control, for example, can ease the security force's burden. Also, the security force commander must have the authority to task main battle area units for support if his force should lose a target that then penetrates the force's battle handoff line.

Several points need to be reemphasized:

- First, within the overall scheme of the task force defense, the security force mission has the potential to be very
- Second, the principles of positioning the security force's elements to make the most of their capabilities and arraying them in depth as listeners, lookers, and shooters will improve the security and effectiveness of both the security force and the task force and will work under most conditions and against any opponent.
- Third, the security force must be as self sustaining as possible, and all units of the task force must be trained to participate as part of the security force should the task force commander choose to commit one.
- Finally, there is no substitute for the estimate process or for considering every mission within an analysis of METT-T (mission, enemy, troops, terrain, and time).

This method of executing a security force battle is from the perspective of a mechanized task force. This article, and some of the lessons learned, may provide a basis for discussion and development and help future security force commanders perform this grueling, critical mission — one that may mean the difference between victory and defeat in the defense.

Captain Edward G. Gibbons, Jr., commanded an antitank company in the 2d Battalion, 12th Infantry, and a rifle company in the 1st Battalion, 10th Infantry in the 4th Infantry Division during training at the National Training Center. He previously served in the 82d Airborne Division and 325th Airborne Battalion Combat Team in Italy. He is now assigned to the Directorate of Combined Arms and Tactics at the U.S. Army Infantry School. He is a 1982 ROTC graduate of Auburn University.





Combat arms leaders all agree on the importance of accurate fire. Nevertheless, our Army has not been successful in training the infantrymen in tactical units to high marksmanship standards. If producing infantrymen who are deadly shots is an important goal, then we must analyze our shortcomings systematically; the widespread nature of the problem indicates that small unit leaders are not being provided with the resources necessary for them to succeed.

We recognize the role of master fitness trainers in improving our physical fitness training; we also recognize the need for master gunners in armor units. Marksmanship should receive equal consideration. Each rifle company should have a designated master rifleman and an assistant master rifleman. The company master rifleman's duties

would be to advise his commander on the unit's basic, advanced, and combat marksmanship programs and to serve as the quality control for company "train-the-trainer" instruction. The conventional approach of using a few outside experts to train a large number of noncommissioned officers in a short period of time is not cost effective and simply doesn't work.

The Infantry School should develop a master rifleman program of instruction, taught by the Army Marksmanship Training Unit either at Fort Benning or in the field using mobile training teams. The course should concentrate on both rifles and machineguns.

If the master rifleman concept does make sense, fiscal constraints should not be a limiting factor. Priorities must

Week 1: M16A2 Rifles						
Day Unit	1	2	3	4	5	6
ННС	Zero Mask fire	Feedback Fire Field Fire Night Fire	Quality			
A Co		Zero Mask Fire	Feedback Fire Field Fire Night Fire	Quality		
В Со			Zero Mask Fire	Feedback Fire Field Fire Night Fire	1 1	
C Co					Feedback Fire Field Fire Night Fire	Quality

 ine battarion should receive priority for the use of training support center training aids during Week 1 as well as during the previous week of PMT.

### FIGURE 1

be established. How can we justify sending large numbers of soldiers to schools that do not produce combat skills of immediate relevance to tactical units and at the same time say the Army can't afford a leader-oriented infantry marksmanship program?

The infantry would also do well to learn from the armor community's approach to gunnery. Tank units are generally given set "range packages" and regard gunnery cycles as prime time training. Generally, division and brigade headquarters try their best not to distract the units as they progress through the tank tables. Good results are expected, and they should be. Unfortunately, infantry units do not approach small arms qualification with a similar intensity, and we should not be surprised by the mediocre results that follow.

If infantry battalions are to be guaranteed the time and the ranges they need to conduct high quality marksmanship training semiannually, installations must develop and allocate supporting range schedules. The system in U.S. Army Europe, in which the 7th Army Training Command structures and assigns range times, can serve as a model.

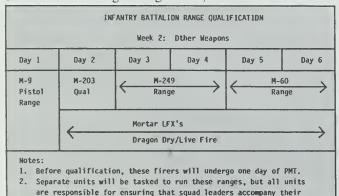


FIGURE 2

A proposed two-week small arms range program for an infantry battalion is shown in Figures 1 and 2. The suggested program supports methodical, progressive marksmanship training taught by a unit's squad leaders instead of by ad hoc committees competing against time.

Installations and divisions should not try to put together one generic range package for all of its battalions, infantry and non-infantry alike, to solve all of their marksmanship problems. Infantry battalions are not expected to train on tank tables, and non-infantry battalions should not be expected to be as proficient in small arms firing as infantry units. Since the basis of a division's rifle firepower lies with its infantry battalions, these battalions should have specifically tailored programs that reflect a requirement to attain the highest standards of marksmanship.

Range time, as well as preparatory marksmanship training (PMT) conducted the week before range qualification, must be priority training for everyone, from the battalion commander down. Since marksmanship is an individual soldier skill, installations and divisions frequently do not categorize small arms qualification as prime time or green cycle training. Since an infantry unit can muster the land, ammunition, and time to qualify only twice a year, though, it must take an approach that strives to have all of its assigned soldiers participate in PMT and subsequent range weeks, even to the extent that its collective training may be marginally affected. Again, if the objective is to develop infantrymen who can fire their weapons accurately, then we must ensure that installation time management systems help us rather than hamper us.

### PRELIMINARY TRAINING

Each range program should be preceded by one week of PMT. Companies, using their master riflemen (or subject matter experts), should conduct two days of training for the leaders at squad level and above. Then the squad leaders should give their assigned soldiers two days of PMT. If training aids are limited, this PMT may have to be coordinated by the battalion headquarters to ensure that the available resources are used equitably and efficiently. A proposed rifle company two-day M16A2 PMT program divided into four blocks of instruction (morning and afternoon) is shown in Figure 3.

During their range times, infantry battalions should move to and live in the field. This is important for several reasons. First, it is the most efficient approach. Qualification ranges are often too far from garrison, and infantry logistics too constrained, to warrant daily transportation shuttles. Second, time will always be a precious commodity. Units that live on ranges consistently put bullets down range at first light and continue to do so until last light. Murphy's Law ensures that any other system will lead to the loss of three or four hours of daylight firing.

Units must take enough of the right kind of training aids to the ranges. A soldier who has difficulty zeroing his rifle, for example — or who performs poorly during feedback,

soldiers to train and coach them.

SUBJECT	TRAINING AIDS				
o Marksmanship fundamentals	o Charts: integrated act of firing, sight alignment, breath control o Shadow box o Belgian prism o Dime (for dime and washer drills)				
o Zeroing (sight manipulation/ shot group analysis)	o Charts: MIGA2 rear and front sights, mechanical zero, shot group analysis				
o Weaponeer zero and fire/ MACS (multipurpose arcade combat simulator) zero and firing/training film	o Weaponeer o MACS computer o Television tapes 7-1 and 7-2 (teaching basic rifle marksman- ship, Parts I and II)				
o Effects of wind and gravity/ adjusted aiming point	o Charts: FM 23-9, Appendix F, Figures 5, 7, 8, 9, and 12				

- Each subject is taught by squad leaders with one-half of day allotted for each. The company progresses through the training by platoon/company headquarters.
- Weaponeer and MACS training will generally require more than the allotted time.

### FIGURE 3

field, or record firing — must be given remedial training on site using such devices as the weaponeer and the shadow box. Too frequently, units continue having a soldier fire until he obtains a zero by chance, or qualifies on paper only. Causes, not symptoms, must be treated.

Most important to the success of a range program, however, is a unit's ability to put its squad leaders in positions where they can coach their own soldiers. The proposed two-week program requires squad leaders to be present whenever their soldiers qualify with their assigned M16A2s, M9s, M203s, M249s, and M60s. Although consolidated ranges are efficient on paper, if first-line supervisors are not present during weapon qualification, haste and waste is almost always the order of the day.

Infantry battalions must also emphasize combat marksmanship as part of their overall training program. Combat marksmanship training includes fire and movement, control and distribution of unit fire, firing under stress, and firing in various weather and light conditions.

The starting point in developing a combat marksmanship program is the realization that small unit live fire exercises will never be conducted as frequently as the commander desires because of resource constraints. At the same time, when live fires are conducted, more Class V (at least 5.56mm) will often be available than is needed to accomplish the basic training objective — a squad reaction to contact, for example. Generally, units focus on one task or battle drill, complete it, and then fire all their remaining ammunition in a "mad minute" against an invisible counterattack.

Commanders must make the most of the opportunities each live fire exercise presents. A squad reaction to contact drill, for example, may consist of an assault during which collective combat marksmanship skills are evaluated by a scoring system that does the following:

- Determines the amount of time the targets were exposed before being taken under effective fire.
- Grades marksmanship (using balloons, fixed target silhouettes inside bunkers, and the like).
- Rewards a unit by giving it credit for any ammunition it has not expended.

Then, instead of having a unit squander its remaining ammunition in fighting off an obligatory counterattack, the squad may force-march to a new position where it fires 20 rounds per man at the 25-meter Alternate Course C on individual lanes. This will give valuable feedback to the chain of command and, perhaps more important, to the individual soldier on the effect of fatigue on marksmanship. Two major training objectives can therefore be accomplished through one live fire exercise.

(As a side note, the major disadvantage of a squad forcedmarch collective live fire exercise today is that no information is provided on how the individual soldier shoots while under stress, and no meaningful corrective training occurs after the exercises. This does not make sense. We must try to evaluate an individual's combat marksmanship skills just as religiously as we test him during semiannual qualifications.)

Additionally, we must stress to our subordinates that MILES is the best combat marksmanship training device available and that they should use it whenever possible. Even



so, if the chain of command does not emphasize marksmanship skills during MILES force-on-force exercises (by stressing boresighting, for example), much of the training benefit that can accrue from using that device will be lost.

An infantry battalion must be imaginative in its approach to marksmanship training and try to gain every possible advantage from every live fire opportunity. For example, some units always set up 25-meter improvised lanes and rezero their small arms before a live fire exercise. Through rezeroing, all soldiers have an opportunity to adjust for changes to their sight pictures. (This is especially important for the younger soldiers.) Rezeroing also reinforces the importance of well-aimed shots before a unit crosses the line of departure.

A second example of making every round count pertains to live fire exercises during which the soldiers wear protective masks. Units often comply literally with the guidance found in Field Manual 23-9 and conduct 20-round firing exercises in MOPP (mission oriented protective posture) from the prone unsupported and individual fighting positions at 25-meter targets. But the soldiers never gain any precise feedback on their accuracy until they have expended all of their ammunition. This kind of firing initially should be at a zero target to provide a soldier with accurate information on how he must adjust his aim to hit the target at center of mass. Only then should he be permitted to fire to achieve the standard of 11 target hits out of 20 exposures.

A third example concerns opportunity firing on live fire exercise ranges. Units should consider conducting MOPP or night firing, or both, whenever a windfall of ammunition appears at the end of an exercise. Opportunity firing strengthens critical marksmanship skills and can also eliminate the need to concentrate on anything except the basics during range time.

Finally, infantry battalions should fire as frequently as

possible. A battalion that is not otherwise conducting range programs or live fire exercises should always schedule at least a 25-meter range and forecast a limited amount of ammunition each month. This range can be used to have newly assigned or reassigned soldiers zero or rezero their weapons, to conduct combat marksmanship training after forced marches, and to carry out both MOPP and limited 25-meter feedback firing exercises. To increase the frequency and quality of our marksmanship training, we should reduce, if necessary, the amount of ammunition fired during collective live fire exercises.

Infantry battalions can improve the quality of their marksmanship programs if they give those programs the proper emphasis. The training strategy outlined here advocates the following:

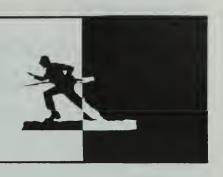
- Establishing a master rifleman program.
- Creating small arms range times and designating these as prime time training.
- Increasing our emphasis on combat marksmanship training.
- Adopting a "make every round count" approach to all live fire opportunities.
  - Firing more often using fewer bullets.

Regardless of the specific marksmanship training strategy an infantry unit adopts, however, it must be based upon this principle: Commanders must not only emphasize marksmanship in words, they must also set up their subordinates for success (down to the squad level) by giving them the necessary training resources and guidance.

Lieutenant Colonel Karl W. Eikenberry commands the 2d Battalion, 87th Infantry, 10th Mountain Division (Light Infantry). He has served in various airborne, ranger, mechanized and light infantry units and as Assistant Army Attache in Beijing, China. He is a graduate of the United States Military Academy and holds a master's degree from Harvard University. Several of his articles have appeared in military journals, including INFANTRY.



# TRAINING NOTES



# The Mechanized Rifle Company As a Leadership Academy

LIEUTENANT COLONEL THOMAS R. ROZMAN

A mechanized infantry company, despite its best efforts, always seems to be performing a balancing act in managing its time. When this is coupled with an equally challenging need to sustain a competent leader cadre in the company, despite an always changing personnel situation, a company commander can be kept on the razor's edge between success and failure throughout his stewardship.

One company's approach uses the company itself as the basic source of its own leaders. The system it develops assumes high levels of leader turnover, particularly in sergeants and staff sergeants, with a constant and often short-fused procession of commitments and taskings that intrude on company programs. The approach does not suggest establishing a school with special staff in the company. Rather, it focuses and orients the company's existing personnel and organization on an established mission - leader development.

This company, a mechanized infantry company in a mechanized brigade based in the continental United States (CONUS), had recently changed commanders. As with most CONUS units, personnel turmoil assured a constant turnover among its junior to mid-level noncommissioned officers, almost 25 percent per quarter. Since these corporals, sergeants, and staff sergeants represented almost 86 percent of the approximately 40 NCOs authorized, the company found itself trying to fill seven to ten vacancies every three months.

### **LOSSES**

Although the company dutifully posted its projected losses — assuring that the battalion's personnel center had current requisitions for all vacancies by grade and military occupational specialty (MOS) — fill was sporadic and too often not timely. Replacements tended to be late, and they frequently lacked the desired breadth of experience. Well-rounded sergeants who had experience at squad level and with maintenance and administration, and who were knowledgeable of supply procedures, were rare. More critically, these NCOs often lacked tactical and "people" skills. For these reasons and others, depth in any single critical area was one man or less.

As the new company commander took stock of the NCO replacement

issue, he began to ask himself how he could assure a smooth flow of competent and prepared NCOs. He has to achieve this objective despite the effects of a constantly changing and unpredictable schedule, an assured high turnover rate, and a less than responsive individual replacement system.

After examining several alternatives that appeared to have promise in solving the NCO turnover problem, the commander formed the rudiments of an NCO leadership development program.

The underlying idea of the program was that the company, in addition to meeting its operational missions, would become a leadership academy for its privates, corporals, and sergeants. Another part of the program would focus on promotable sergeants, staff sergeants, and sergeants first class. Specifically, it would include ways to enable these soldiers to perform their current duties to an increasingly professional standard. More important, it would prepare them to assume the duties of the next higher rank.

To initiate the program, a plan was outlined that focused on three components:

Component 1. Identify private soldiers, privates first class (PFCs), and specialists fourth class (SP-4s) who show NCO potential and (through a professional development track) prepare them to perform as NCOs.

Component 2. Professionally develop corporals and sergeants to prepare them for promotion and assumption of the duties of team and squad leaders.

Component 3. Professionally develop promotable sergeants, staff sergeants, and sergeants first class for promotion and assumption of duties as platoon sergeants and first sergeants.

This plan considered Army-directed promotion requirements for each grade such as schools, awards, experience, and skill test requirements. The plan also looked at the opportunities the company offered for experience by MOS in terms of available positions. (The mechanized infantry company tables of organization and equipment at the time authorized NCOs in the following MOSs: 11B, Infantryman; 11C, Mortarman; 11H, Antiarmor; 76Y, Supply; and 63C, Maintenance.)

The company commander decided that if his plan was to succeed it had to orient all three components, in terms of this environment, on two progressive objectives. The first was to help the soldiers succeed at promotion boards. The second was to inculcate in the soldiers a sense of commitment to the program and to ensure that all members of the company realized it would lead to opportunities for advanced experience and responsibility for junior soldiers, and a continuous flow of competent subordinates from within the company to fill critical company positions. The latter point, of course, had to be balanced by a fair and effective integration of new men from outside the company.

The company commander had access to a wealth of resources: The company's soldiers, officer and NCO leaders, authorized NCO positions, equipment and organization, and operational missions along with installation and Army schools, the installation training aids support center, and also NCO accessions, losses, and position vacancies.

He believed that these assets, if used

properly, would produce an abundance of competent professional NCOs. To achieve this result, though, the company needed an overall management mechanism and, for each of the three components, a relatively simple, but aggressively pursued subprogram.

The key players in assuring the proper execution of the plan and achieving the objectives were to be the company commander, the first sergeant, the training NCO, and the platoon leaders, supported by the platoon sergeants, the motor sergeant, and the supply sergeant. The platoon sergeants, in particular, would play a major role in identifying, counseling, and otherwise developing the promising soldiers in their platoons.

### ASSESSMENT

If the company was to function properly as a practical leadership academy and producer of its own NCO leaders, it also needed to identify clearly and realistically what could be accomplished in a unit that already had a tough and busy schedule. The answer rested on the following:

- An accurate knowledge of existing leaders, including an assessment of their capabilities and potential.
- A method of assessing privates for the same qualities.
- An effective system of tracking vacancies in leadership positions and planning for placing candidates in these positions. (This included monitoring 90-, 60-, and 30-day losses, observing soldiers, actively discussing with platoon leaders and platoon sergeants their assessments of soldiers, and conducting first sergeant and company commander interviews.)
- A system of successive assignments for soldiers during the time they could normally be expected to remain in the unit - 18 months, 24 months, and the like. (This sequence of assignments would be designed to broaden a soldier as a professional and a leader in terms of his practical understanding of the company's operations and business.)
- · An embedded and effective sense of responsibility for subordinate profes-

sional development among the senior leadership of the company.

• The full use of available resources. (For example, if a soldier was promised a school and an opportunity to use his new knowledge, the company would have to have a vacancy at the desired school and then would have to have an appropriate assignment for the soldier on his return.)

Obviously, to achieve effective results in the face of all the constraints, the company needed methods and practices that would harness the resources and apply them in support of the program's three components. One of the devices the company commander used to manage the program was a matrix of NCO positions that was built from the TOE. The matrix included the following:

- The incumbent in a position, along with his anticipated departure date, and a planned replacement when he was within 90 days of departure. (Primary and alternate replacements were identified.)
- Key data relating to each soldier: his assignment date and anticipated time of reassignment, and his professional status (standing on a promotion list, professional schools, tests, and the
- The soldiers within the company who had been identified for initial NCO positions or higher NCO positions and their development status in terms of experience and schools. (This included performance assessments by their chain of command. This group, both identified replacements and NCO development track soldiers, constituted the company's internal NCO replacement resource. Counting PFCs and SP-4s, this group came to average about 50 soldiers available at any one time to fill NCO requirements.)
- Incoming NCOs. The company was aggressive in pursuing personnel data to obtain the best pre-assignment possible. The new soldiers were interviewed by the first sergeant and the company commander during their first few days in the company.

To update this matrix, the first sergeant and the company commander conducted monthly reviews of soldier

performance with the chain of command. If a soldier's performance was less than desired for the program, a more thorough review of his counseling records followed. The first sergeant and the company commander then jointly reviewed the results and determined the soldier's assignments, his continuation in the program, or other actions that might be necessary. The reviews could be conducted more frequently as vacancies occurred. (Intermittent disciplinary situations would also precipitate such meetings.) Both the first sergeant and the company commander would counsel soldiers and advise their chain of command of the results of the review.

The training NCO was a critical member of the review team in that he was expected to manage two key areas.

First, he was to make an aggressive effort to obtain all available troop school slots (both on and off post) appropriate to NCO professional development, and for other specialized training (supply, maintenance) related to the company and its operations. The training NCO, working directly with the first sergeant and the company commander and based on the results of the monthly reviews, would select two primary and two alternate candidates for each course and then schedule them for screening and counseling (usually with the company commander or first sergeant, with the training NCO as backup). This counseling was intended to ensure that the soldier understood how important the school was to him and the unit and also to make sure the soldier did not have personal or other problems that might compromise his performance.

Second, the training NCO was to report on school performance results at the monthly review. This would include progress reports on the soldiers who were attending schools. The objective was to identify a problem and a possible remedy early enough to prevent failure.

The training NCO was to maintain a complete library of correspondence course catalogs, and was to encourage soldiers to take those courses that were appropriate to their level of development. Thus, a soldier who was to be assigned to the supply room would enroll in a supply course, while a SP-4 who was programmed to pin on corporal stripes and assume the duties of a rifle squad team leader would take a pre-NCO course. As with the resident courses, the training NCO monitored the soldiers' progress regularly through their academic reports. No soldier would assume a position unless he had successfully completed the preparatory resident or correspondence course.

To recognize a soldier's movement into leadership positions, the company commander and the first sergeant could use one of several different methods to highlight the moves — personal interviews, for example, and announcements in formations, letters for official files, certificates, and awards. Ultimately, the



primary recognition became regular and steady promotions, soldier performance (fully competent to outstanding), and additional promotions for program alumni.

Along with the positive aspects of this program, the company also had to deal properly with its substandard soldiers. For this purpose, the company chain of command was specifically oriented to handle, expeditiously but fairly, the soldiers who did not measure up. To protect the prestige and integrity of the NCO rank and position of leadership, sergeants who demonstrated an inability to perform as NCOs had to be removed from their positions as quickly as possible and, when necessary, denied the rank as well.

There were three important elements

in this part of the program:

First, the administrative machinery had to be efficient. Elimination or reassignment procedures had to be correct, thoroughly developed, and effective. The worst possibility would have been to allow a sergeant who was known to be substandard linger in the company as an NCO; this might give the soldiers the impression that the company was powerless to remove him.

Second, everyone in the chain of command had to use the counseling system, combined with the uniform code of military justice, properly. The entire chain of command was held to a high standard of counseling. It had to be perfectly clear that when a sergeant appeared before the company commander for an Article 15 hearing, previous efforts had been made to correct his defects. These efforts were to be made available to the commander in a counseling record by the soldier's chain of command.

(Certainly, there would be examples of a good soldier making the "one time mistake," and to keep from ruining a good man unnecessarily, each case was assessed on its own merits. Every soldier's dignity was to be respected, even one who may have shown the least potential. The counseling statements generated by this process were essential to the expeditious administrative processing of reductions or eliminations. The entire chain of command was made aware of this point.)

Third, once reasonable counseling had failed, soldiers who demonstrated substandard performance in the program had to be removed, and the program had to have a system for dealing with them. These soldiers would essentially fit into three groups—those who should be eliminated from the service, those who might have potential but who needed a fresh start in another company, and those who definitely had potential but needed a fresh start within the same company.

The first sergeant and the company commander both understood how important it was for this system to be efficient and responsive. They also understood that the system would not work without swift administrative action based on a soldier counseling system and the quick departure of substandard soldiers.

The company commander, the first sergeant, and the company chain of command quickly emplaced this management system, and it was functioning within two months. Within three months, it was producing its first graduates as corporals and sergeants.

Also critical to success was the subsystem developed for each of the three program components being managed under this system. Some discussion on each is important to an understanding of the results that were ultimately achieved.

Making NCOs from Privates. This was the most creative part of the program. The company would take the raw material of its PFCs and SP-4s and develop them into competent NCOs. Properly managed, a system for doing this would greatly mitigate the unevenness of the NCO replacement system. In fact, it had the potential to produce more NCOs than the company needed, and therefore to become a source of NCOs for other units. This, in fact, began to happen after the program had been in operation for six months.

The system that took shape within two months essentially consisted of the following design:

- Once a soldier was identified for the program, a series of successive assignments was mapped out for him during whatever period of time he had remaining in the company.
- The objective for these soldiers would be to expose them to the business of the squad first as a squad member, preferaby for four to six months. Ideally, a soldier would serve as a rifleman initially, then as a grenadier or machinegunner or driver. Company policy required that each squad maintain one primary and two alternate drivers who were licensed. The alternate drivers had to be proficient in their assigned squad positions and also had to become familiar enough with driving the squad's vehicle and its preventive maintenance to serve as the driver when necessary. With this policy, in four to six months

with the squad, most soldiers were exposed to at least two squad duties, possibly three.

• During this initial assignment in the company, a soldier's leadership potential was continually evaluated. If he was considered leadership material, he was selected for assignment to one of the company's special areas — supply, arms room. (There was more diversity in the mechanized company TOEs at that time, but this principle could be applied to today's companies as a cross training mechanism or using a supernumerary concept in which a soldier understudies a certain position, such as training NCO. The company com-



mander used this approach as a later refinement.)

- Before assuming these duties, a soldier would have to prepare for them by completing at least one correspondence course. (Several soldiers might be oriented on a particular position at the same time, with the ultimate selection being made on the basis of their subsequent duty and course performance.)
- These specialized duty assignments would expose soldiers to broader aspects of company business outside the squad that were essential to the company's operations. This knowledge and experience would add significantly to the soldiers' development as NCOs and leaders in terms of how the company ran and how it could support their soldiers when these tasks were done well.
- While assigned to these functions (usually for five or six months), soldiers were enrolled in pre-NCO correspondence courses, at least, and were also sent to available resident basic courses.
  - On the basis of their performance

in specialized areas and the pre-NCO course, soldiers were identified and considered for appointment as corporals or promoted to sergeant if they were eligible. (Ultimately, because there were not enough specialized areas, more creative approaches involving supernumerary and other devices became necessary.)

• Upon selection for appointment to corporal, soldiers were then identified to fill projected or open leadership vacancies, usually as rifle team leaders.

At the point of assignment to an NCO position, soldiers then entered management under Component 2.

Professional Development of Corporals and Sergeants. This component assured that new NCOs developed under Component 1, and NCOs of these ranks recently assigned to the company, were oriented on a track that would prepare them for promotion, proper performance of their current duties, and duties at the next level. The form the program took was essentially as summarized here:

- All NCOs in this category were enrolled in the next level of the NCO correspondence course program. If a corporal recently assigned to the company had not completed any formal NCO instruction, he was immediately enrolled in the initial correspondence course.
- The company sought to place all NCOs at this stage in a resident NCO course timed to support their contribution to company missions and their individual promotion competitiveness.
- NCOs assigned to the company who had not served previously outside rifle squads were identified for rotation to a company special area. They were then enrolled in the appropriate correspondence course. Again, the intent was to broaden their awareness of company functions and to provide enough soldiers who were capable of performing in the special areas.
- The monthly reviews indicated where the NCOs were in the program specifically, who was ready for assignment from a position of team leader to a specialized assignment (reenlistment, training) or to squad

leader if there was a vacancy and a staff sergeant was not available, and who was ready to be selected for promotion to sergeant or staff sergeant.

· Through the reviews, the counseling system described in the management section, and the emphasis on schooling requirements, soldiers were made aware that the company was interested in their professional development and advance-

Component 2 also had an important obligation to an individual soldier to assure that he developed to his full potential and that he was properly advised of his strengths or weaknesses. In terms of strengths, for example, a soldier might indicate a potential for commissioned service. At this point in the program (or earlier during Component 1), he would be counseled accordingly. All mid-range and senior NCOs were encouraged, as their performance indicated, to consider seeking reserve commissions. (This counseling effort was not intended to discount the value of thoroughly professional career NCOs, without whom the Army could not operate. The rationale behind it was that the toughest challenge a mobilizing Army faces is to expand the officer corps with competent, seasoned, company grade officers, and that the regular NCO corps represents one of the best sources for such battle leaders.)

On the other hand, a superb NCO might have several weak areas in his record that needed attention, perhaps a lack of the necessary civilian education. Consequently, during these assessments and in cooperation with the chain of command and the training NCO, soldiers who needed such improvements were supported in entering and completing available civilian education programs.

This component arrangement met the program's objectives by assuring the company a larger pool of experienced, professionally prepared NCOs ready to assume the duties of squad leaders and platoon sergeants from within the company. It also reinforced an individual soldier's competitiveness within the NCO corps by assuring him as complete a military and civilian education and experience background as possible.

Professional Development of Staff Sergeants and Sergeants First Class. This component focused particularly on staff sergeants. Schools, counseling, and assignments designed to prepare these soldiers for their current duties, for duties at the next level, and for promotion were tailored into individual soldier programs. The importance of this emphasis sprang from the realization that staff sergeants were the immediate second line of NCO leadership behind the sergeants first class. When one of the five SFC positions authorized in the company was not filled by a soldier in that rank, or when an SFC was on leave, on quarters, or in the hospital, the senior SSG had to be prepared to perform his duties. If the SSGs were ill prepared, obviously the company's operations and its soldiers would suffer.

Since the SFCs were, for the most part, veterans of long service and the most experienced soldiers in the unit, the program sought to orient their professional development and to help them reach their personal career objectives. The program did help these soldiers seek improvement, where performance indicated it was needed, through schooling or counseling. Primarily, the situation in the latter category consisted of insufficient military education background, as opposed to performance of duty or competency.

Over time, the implementation and refinement of this leadership academy program made the company virtually self-sufficient in NCO leadership. It provided a depth of capability in all leadership positions. For example, the company could suffer a loss of 10 to 15 NCOs in a quarter and replace them from its internal resources. Additionally, the program assured the company considerable backup in all of its technical areas. After six months of operation, a pool of three or four additional soldiers had developed who were trained and available as replacements in each specialized area — supply, arms room, NBC (nuclear, biological, and chemical), and the like. At the same time, this broadened individual experience translated into improved squad and platoon operations.

Given the current trends in the Army, certain aspects of this approach toward developing NCOs may have broader use. In fact, if the Army's training resource base becomes more constrained in the future, self-contained unit programs may become necessary.

The claim that current unit schedules preclude such programs is, in my view, invalid. The example cited occurred in a busy TOE company. Further, new technologies are increasing the feasibility of conducting a company leadership academy, examples of which are various distributed learning and training programs in which instructional material is presented to soldiers through such media as video tapes and computer software programs in an effective, responsive, and easily available format.

There is little question that different units, in whole or in part, have duplicated such a program over the years. But NCO development in units has never been embraced as a uniform expectation. In fact, trends over the past 10 years with extensive focus on operational missions — have probably discouraged it.

As a postscript, it is worth considering that other modern armies have somewhat similar programs. In the case of the German Army, something that may be described as a unit NCO academy is in operation. Essentially, a battalion creates an additional company of one officer and eight NCOs. Each of the NCOs is responsible for training three or four NCOs to standard. This is a full-time effort based on a two- to fourweek program of instruction.

Perhaps the time has come to formalize a way of training the NCO leaders in our units. Such a system would more effectively balance the role of the school, the personnel system, and the unit in developing NCOs.

Lieutenant Colonel Thomas R. Rozman is assigned to the Office of the Deputy Chief of Staff for Training, U.S. Army Training and Doctrine Command. He previously served as chief of G-3 training resources, 1st Armored Division. He is a 1970 graduate of the United States Military Academy and holds a master's degree from the University of Massachusetts.

# Platoon EXEVALS In a Light Infantry Battalion

**MAJOR EUGENE J. PALKA** 

Platoon external evaluations (EXE-VALs), using a challenging and realistic scenario that includes a well trained opposing force (OPFOR), are conducted to assess the readiness of a battalion's rifle platoons. In a light infantry battalion, planning and administering platoon EXEVALs requires accurate forecasting, effective coordination, and training and orientation for evaluators and controllers. Moreover, platoon EXEVALs are normally a battalion's most expensive training event of the year in terms of total expenditure of critical resources. These resources include manpower (to orchestrate the event and to support and evaluate the platoons), ammunition, transportation, fuel, training areas and ranges, training aids, and flying hours.

Usually, the evaluators, controllers, range operators, and OPFOR must be provided from the battalion's own internal personnel assets. But perhaps the greatest challenge the S-3 faces is allocating and managing the time needed to plan the exercises, reconnoiter the ranges and training areas, train the evaluators, and conduct the necessary tactical exercises without troops (TEWTs).

The S-3 normally conducts some of this planning well in advance so that he can forecast the resources and program support that will come from support elements. Unfortunately, much of the preparation involving evaluators, OPFOR, and support elements must be accomplished along with other daily

activities and priority events just before the EXEVALs.

The following approach to planning and administering platoon EXEVALs in a light infantry battalion may prove helpful. This approach recognizes the need to develop the EXEVAL program in the yearly training guidance, refine it during the quarterly training briefing, and allocate the time to train the personnel to assume their responsibilities during the training event.

An obvious start point for the planning phase is to select the specific platoon tasks that are to be evaluated. The S-3 and the battalion commander carefully choose the appropriate missions, and the S-3 logically incorporates these tasks into a battalion field training exercise with a realistic scenario.

The tasks to be evaluated are selected on the basis of the unit's mission essential task list (METL), unit assessments of the battalion's platoons, the concurrent training opportunities that specific tasks afford, and the available training resources. The METL provides the focus for ensuring that the battalion uses its training resources to train the platoons on the collective tasks they must perfect to support the company and battalion missions.

The unit assessment of each rifle platoon can help the company commanders, the battalion commander, and the S-3 recognize specific trends. From the assessments, these leaders may be able to identify particular tasks in which several platoons are either untrained or

need practice and then give such tasks priority during the EXEVALs. Similarly, by reviewing past training exercises and looking at the long-range training calendar, they may be able to identify specific tasks that have been, or will be, performed repeatedly. If most of the platoons are already trained in these areas, the leaders can exclude such tasks from the EXEVAL scenario.

Where possible, the S-3 should attempt to integrate platoons from different companies into a single mission scenario during the evaluation. For example, one platoon may conduct a reconnaissance of an urban area within which another platoon is establishing a defense. The two platoons can then be evaluated simultaneously on two different tasks, using a single training area and no OPFOR, other than what they provide for each other. To make the most of training resources, planners should make every effort to evaluate platoon missions concurrently instead of consecutively.

A commander never wants to limit the quality of training because of resource constraints, but he may have to limit the duration of an EXEVAL or the number of tasks to be evaluated because of a shortage of ranges, training areas, flying hours, or certain types of ammunition. Some resource shortages cause only minor adjustments. At times, though, certain tasks may have to be modified or even eliminated because of a lack of resources.

Lieutenants who have already per-

formed successfully as platoon leaders are the ideal choices for evaluation duty. These officers are probably now assigned as company executive officers or as battalion staff members. During the EXEVALs, they will be expected to remain separate from their parent units or staff sections. This means that company commanders, first sergeants, supply sergeants, and staff section chiefs must pick up the additional workload.

One evaluator is assigned for each of the tasks to be evaluated, and each is responsible for evaluating all of the rifle platoons on his particular task. This approach assures standardization and enables each evaluator to assess each platoon's proficiency accurately in relation to that of the other platoons in the battalion.

The S-3 is responsible for evaluator training. Before the EXEVALs begin, at the least he conducts a TEWT with each evaluator on the piece of terrain where a particular mission will be conducted. In addition, the S-3 walks through the mission using the specified mission training plan (MTP) that is given to the evaluator. The S-3 also provides a copy of the written operations order (OPORD), if it is available during the TEWT, or the fragmentary order (FRAGO) that will be given to the platoon. To ensure that each evaluator is well versed on the task he will evaluate, the S-3 may have to supplement the TEWTs with classes on tactics, troop leading procedures, and presenting OPORDs.

Before each mission during the EXEVALs, the assigned evaluator provides the company headquarters with a written copy of the OPORD before presenting it orally to the appropriate platoon leader. After issuing the order, the evaluator remains with the platoon until the mission is complete. Upon completion of each mission, the evaluator conducts an after action review with the entire platoon and the OPFOR (if one has been used), then privately conducts a critique with the platoon leader and platoon sergeant. He also provides immediate feedback to the company commander.

The evaluators subsequently return

### **DIVISION OF LABOR**

#### Battalion S-1:

- Process casualty feeder reports in support of the exercise scenario.
- Process POW reports in support of the platoon missions.
- S-1 officer: evaluate task specified by the S-3.
- Maintain accountability and perform normal personnel and administrative operations in accordance with the battalion's tactical SOP.

#### **Battalion S-2:**

- Develop paragraph la (enemy situation) for all OPORDs and FRAGOs.
- Provide daily intelligence summaries and weather eports.
- S-2 officer: evaluate task number 8-5, area reconnaissance, for all platoons.
- Perform routine duties in accordance with the tactical SOP.

### **Battalion S-3:**

- Assume overall responsibility for preparation and conduct of the EXEVALs.
- · Serve as the chief evaluator for the event.
- Coordinate all external assets required to support the exercise.
- Coordinate use of appropriate training areas and ranges.
  - · Establish and coordinate evaluation procedures.
- Task appropriate units for support.
- Operate the control headquarters and tactical operations center.
- Publish all OPORDs and FRAGOs.
- Conduct TEWTs and evaluator training as required.
- Provide evaluation packets to all evaluators.
- Orchestrate all air mission briefs in accordance with the battalion SOP.
- Provide the S-3 Air to conduct evaluation of air assault missions.
- Orchestrate a battalion level after action review upon completion of the training event.
- Consolidate evaluations and produce a written evaluation packet for each company.

### **Battalion S-4:**

- Assume overall responsibility for the logistical support of the training event.
- Coordinate and control ground transportation as required.
- Request, draw, and deliver Class V in accordance with the S-3's guidance.
- Coordinate Class I, II, III, and IV with the S-3
- S-4 officer: evaluate task specified by the S-3.
- Establish logistics center in accordance with the tactical SOP.

### **Communications Platoon:**

- Reserve range drops in support of the battalion TOC and trains
- Lay wire to all company command posts (CPs) and between the TOC and control headquarters.
- Establish FM communications on three nets (battalion command, administrative/logistical, and control).

• Designate spare frequencies for OPFOR use.

### **Support Platoon:**

- Provide a maintenance contact team with the combat trains
- · Provide vehicle recovery assistance as required.
- Pick up and deliver Class V in accordance with the S-3's schedule.
- Conduct normal support operations in accordance with the tactical SOP.
- Support platoon leader: evaluate task specified by he S-3.

### Medical Platoon:

- Provide one medic to each rifle platoon.
- Establish the battalion aid station in accordance with the tactical SOP.
- Coordinate ambulance support for all live fire xercises.

### Mortar Platoon:

- Establish firing positions and radio nets to support calls for fire.
- Fire high explosive and smoke in support of all live fire exercises.

#### **Scout Platoon:**

- Perform OPFOR missions in accordance with the operations schedule.
  - · Conduct area reconnaissances as directed.

### Headquarters and Headquarters Company:

- Provide evaluators in accordance with the S-3's guidance.
- Establish layout for the TOC area and the control headquarters.

### Companies A, B, and C:

- Prepare rifle platoons with appropriate organic equipment to undergo EXEVALs.
- Provide logistical and administrative support to platoons per SOP.
- Establish company CPs for control purposes, reporting, and support of the exercise scenario.
- Provide executive officers to perform as evaluators in accordance with the S-3's guidance.

### Company D:

- Provide vehicles with mock-ups and drivers to support the execution of antiarmor ambushes.
- Provide evaluator support in accordance with the S-3's guidance.

### **HSB/Artillery Battalion (DS):**

- Provide forward observers for each rifle platoon and the battalion mortars.
- Provide FSE to monitor fire support nets and to control live fire missions.

### **Engineer Platoon:**

- Support platoon defensive positions with barrier materials, minefields, countermobility obstacles, and survivability positions.
- Support attacks on urban areas with the special engineer equipment necessary to breach obstacles.
- Support platoon movement to contact/hasty attack (live fire exercises) by breaching wire obstacles with bangalore torpedos, and clearing minefields.

to the tactical operations center (TOC) to debrief the S-3 and the battalion commander. The S-3 helps the evaluators summarize their observations and prepare their written comments, maintain the status on each platoon, prepare

a packet of written feedback for all company commanders, and consolidate key lessons learned so that a battalion level after action review can be conducted at the end of the exercises. The written feedback and updated platoon assessments are also used to focus future training.

Because the battalion must rely on its own internal assets to conduct the EXEVAL, each rifle company headquarters, the headquarters and headquarters company, the antiarmor company, the specialty platoons, and all of the staff sections are expected to support the battalion training event. It is essential that the S-3 outline procedures, assign responsibilities, and identify support requirements in a wellorganized letter of instruction (LOI). The LOI is published six to eight weeks in advance and is briefed to avoid confusion and to fix responsibility, and representatives from all participating elements are included in the briefing.

Final details and administrative instructions are covered during the presentation of the battalion OPORD before the units deploy to the field. As during the briefing on the LOI, all support representatives are required to attend.

A recommended division of labor is shown in the accompanying box that can easily be modified to suit unit needs.

While these elements are actively involved in supporting the EXEVALs, the battalion commander and command sergeant major should take advantage of the training events to observe each platoon leader and platoon sergeant personally. There is no better opportunity for the battalion's senior leadership to assess the strengths and weaknesses of the unit's platoons in a tactical environment. Moreover, since the senior leaders are not actively involved in carrying out the tactical missions (as they are in battalion or brigade field training exercises), this training event offers the battalion commander and command sergeant major an ideal occasion for coaching the unit's platoon level leaders.

When it deploys to the field, the battalion establishes a forward operating base (FOB). Within the FOB, each company is given a sector of responsibility within which its platoons establish their defensive positions. The defense task is evaluated as a progressive effort. After each mission, a platoon

returns to its sector to continue with its priority of work in the defense.

The battalion TOC, the combat trains, and the company command posts (CPs) are all established within the FOB according to the battalion's normal SOP. In addition, an evaluator CP is located near the TOC.

It is recommended that at least one of the selected tasks be conducted as a live fire exercise. The movement to contact and hasty attack missions are ideal for this purpose. Engineer assets can be integrated to breach wire obstacles; battalion mortars can support the scheme of maneuver; and a variety of such special weapons as LAWs and



grenades can be employed. Moreover, since there is a natural progression from one task to the next, two tasks can be evaluated by a single evaluator on a given range. Live fire exercises add realism that enables soldiers to gain confidence in their weapon systems and also pose an additional leadership challenge for the platoon and squad leaders.

The use of the multiple integrated laser engagement system (MILES) is strongly recommended for all other missions. The immediate feedback gained from MILES helps an evaluator objectively evaluate a platoon's perfor-

mance. Accordingly, the detailed inspection of all MILES equipment must be an integral part of the troop leading procedures before each mission for both the platoon being evaluated and the OPFOR. The effectiveness of the MILES equipment depends on the way it is maintained and technically employed. To ensure that these systems have been properly checked and put into operation, each evaluator should carry a controller gun throughout the mission.

OPFOR personnel must be carefully managed. They should not be employed as "details" but should be given realistic ARTEP missions to perform. Unit integrity must be maintained to enable the OPFOR chain of command to exercise its normal SOPs and troop leading procedures. The battalion scouts, the antiarmor company, and the evaluated platoons themselves can all be used to support OPFOR missions.

The battalion mortars are on call to support all platoon missions, and calls for fire are an essential part of each evaluation. Other integrated training includes the use of NBC conditions and air assault operations. Training opportunities in both areas are incorporated into the EXEVAL scenarios to add realism and to reinforce the way light infantry platoons are expected to be able to conduct their business.

During the EXEVALs, the rifle company commanders play a key role in support of the scenarios. Specifically, each commander serves as a safety officer and accompanies each of his platoons during the movement to contact/hasty attack (live fire) mission. Commanders also attend all air mission briefs with their platoon leaders to broaden their own perspective and to help coach their subordinate leaders.

During the mission to attack an urban area, platoons are evaluated as part of a company attack (planned and led by the unit commander) against a platoon in the defense (which is also being evaluated). Throughout the EXEVALs, company CPs are required to send all standard reports in accordance with the battalion tactical SOP.

Rifle platoons are the most basic combat units that the battalion com-

mander employs and manages during a tactical operation. To ensure that these platoons are combat ready, the platoon EXEVALs must be recognized as a priority event on the yearly training schedule.

It is absolutely essential that the event be scheduled at a logical point in the course of the yearly training program, and that the battalion commander, S-3, and company commanders recognize the need for allocating preparation time well in advance of the event. While the train-up period for the evaluators may represent a short term inconvenience to a company or a staff section, it represents a long term investment to the battalion.

The platoon EXEVALs should not be an isolated training event. They should reflect the unit's METL and be closely linked to other highlights of the yearly training program. Moreover, the EXEVAL results must be effectively captured

during timely after action reviews, and in writing, and must ultimately be used to plan and guide future training.

Major Eugene J. Palka is assigned to G-3 Operations, 6th Infantry Division, Fort Wainwright, Alaska. He has served on the faculty of the United States Military Academy and in a variety of assignments including company command and battalion S-3 in the 101st Airborne Division. He is a 1978 graduate of the Academy and recently completed the Army's Command and General Staff College.

## **Infantry Mortar Hipshoot**

### LIEUTENANT SEAN M. O'BRIEN

In recent years the U.S. Army has developed the M23 mortar ballistic computer (MBC). The intent behind its development was to enable infantry mortars to provide more accurate and timely indirect fires and, essentially, the Army has achieved this goal. However, the MBC is no better to use than the plotting board for hipshoot missions, because it takes roughly the same amount of time to put all the set-up data into the computer as to use the plotting board.

Unfortunately, plotting board skills have deteriorated because many soldiers have chosen to rely exclusively on the computer, little realizing that the computer can fail at any time for any number of reasons and they will then have to use the plotting board.

Admittedly, using the school-taught technique on the plotting board, a hipshot does take a considerable amount of time and computational skill. When computing the data, for example, a leader must first fumble with his map and protractor to determine the direction and distance to the target. The time required to complete this task varies with the leader's navigation skills. He then uses three to four more minutes to set up the board, and probably another 30 to 60 seconds to compute the data.

The accuracy of this technique is also somewhat questionable. For example, given a map, a protractor, and two grids, ten people are likely to give you ten different directions and distances to a target. But looking at the map and plotting board as two-dimensional graphs with X and Y axes intersecting, a leader can produce more responsive and accurate data.

During a field training exercise, the mortar platoon of the 2d Battalion, 27th Infantry at Fort Ord used the following technique with consistently outstanding results. It is easy to understand and compute, and it offers other advantages as well. The direction and the distance are found mathematically—thus eliminating the guesswork associated with the old plotting board technique of using a map, a protractor, and a bar scaleand it is faster and more accurate.

With this technique, a round is enroute to the target in one and onehalf to two minutes, while the soldier using the older technique is still computing data. (Remember, the mission of the infantry mortar is primarily to suppress, not to destroy. It is, therefore, crucial to have the most responsive indirect fire system possible.) Another advantage is that, because the direction and distance are known so quickly, the charge book or whiz wheel can be used immediately. It also helps in determining whether or not to use the pivot point of the board to represent the mortar position.

In addition, the method is easy to teach. New soldiers pick it up very quickly, which means all the members of a squad, section, or platoon can compute and fire a hipshot. And because it is so much easier than the school-taught method, squad leaders are more likely to use the plotting board than the MBC for a hipshoot mission. Tactically, this technique increases a mortar platoon's survivability, because it allows gun squads to operate more efficiently and effectively as independent elements.

To understand the concept behind the

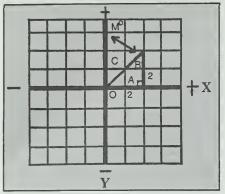


Figure 1

technique, recall the Pythagorean theorem, which states that the square of the hypotenuse of a right triangle is equal to the sum of the squares of the other two sides, or  $A^2 + B^2 = C^2$ .

Start with a graph of X and Y (Figure 1). With X being the horizontal axis and Y being the vertical, at the intersection, X = 0 and Y = 0, normally written (0,0). X decreases to the left of 0 and increases to the right; Y decreases downward and increases upward. Imagine the mortar location at (0,0) and the target at (2,2), the point where X = 2 and Y = <math>2. Think of these two locations as grids, and remember that when reading a map, you read to the right (east) and up (north). Grids increase to the right (E) and up (N) and decrease to the left (W) and down (S). X is therefore east and Y is north. and the target is northeast of the mortar location.

Looking at the right triangle formed by these lines, now labeled A, B, and C, and given that A = 2 and B = 2, you can determine the distance from mortar to target by finding the length of C. Using the formula  $A^2 + B^2 = C^2$ ,  $4 + 4 = C^2$ .  $C^2 = 8$  and C = 2.828 (the square root of 8), which is the distance to the target. The angle of fire is taken from the angle M (90 - angle XY = M) or from rotating the disk of the plotting board.

To understand the target direction or location from your mortar position, just remember the following:

- If the easterly grid of the target location is greater than the easterly grid of the mortar position, the target is east.
- If the northerly grid of the target location is greater than the northerly

grid of the mortar location, the target is north.

- If the easterly grid of the target location is less than the easterly grid of the mortar location, the target is west.
- If the northerly grid of the target location is less than the northerly grid of the mortar position, the target is south.

To prepare the plotting board for either a 60mm or an 81mm mortar hipshoot mission:

- Determine the gun position.
- Determine the location of the target.
- Convert the gun and target positions to 10-digit grids by adding the appropriate number of zeros. (To ensure that the distances are accurate to one meter, it is necessary to express them as 10digit grids.)
  - Determine the difference between

the two grids by subtracting the easterly grid reading for the location of the mortar from the easterly grid reading of the target and the northerly grid reading of the mortar location from the northerly grid reading of the target.

Two examples will illustrate:

In the first (Figure 2), the gun location is easterly 5874 and northerly 8922. Add zeros to get 58740 and 89220. The target location is easterly 6099 and northerly 9155. Add zeros to get 60990 and 91550.

The difference between the easterly grids (60990 - 58740) is 2550. Since the grid for the target location is greater than that of the mortar location, the direction is east.

The difference between the northerly grids (91550 - 89220) is 2330. Since the grid of the target location is greater than

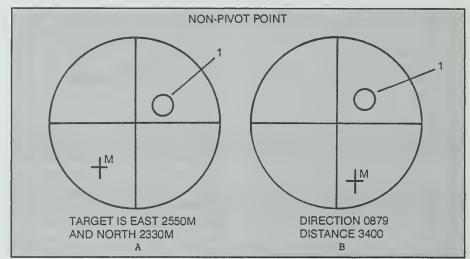


Figure 2

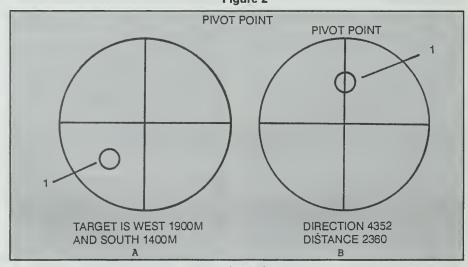


Figure 3

that of the mortar location, the direction is north.

The target is therefore 2550 meters east and 2330 meters north.

In another example (Figure 3), the gun location is easterly 601 and northerly 524. Add zeros to get 60100 and 52400. The target location is easterly 582 and northerly 510. Add zeros to get 58200 and 51000.

The difference between the easterly grids (60100 - 58200) is 1900. Since the grid of the target location is less than that of the mortar location, the direction is west.

The difference between the northerly grids (52400 - 51000) is 1400. Since the grid of the target location is less than that of the mortar location, the direction is south.

The target location is therefore 1900 meters west and 1400 meters south of the mortar position.

Now that you have the information necessary to determine the distance from the mortar position to the target, you can begin computing your gun data.

- Align the zero of the azimuth scale on the rotatable disk with the zero of the green vernier scale, located at the top of the board.
- Select any heavy grid line intersection and mark it with a small plot enclosed with a mortar symbol (see Figures 2-A and 3-A). If your calculations show that you will be moving to the east and north, then start in the opposite quadrant, that is, the southwest portion of the board. The pivot point may also be used.
- From the mortar position plot, move the predetermined direction and distance (each small square has a value of 50 meters and each large square a value of 500 meters).
- Once you have moved the right distance, the ending point becomes the target plot. Circle this plot and mark it with a l, annotating it as your first plot. If you find that you cannot go the full distance you determined, you will need to go back and move your mortar position so as to allow the target to be plotted.
- To determine the azimuth to the target (Figure 2-B), rotate the disk until

- the No. 1 plot is aligned with the center vertical grid line or with the mortar position (see Figure 3-B). Always keep the mortar closer to the bottom of the plotting board.
- Once you have determined the direction of fire (DOF), round it off to the nearest 50 mils and it becomes the mounting azimuth (MAZ). Once the MAZ is determined, write (superimpose) the referred deflection under this number.
- Realign the mortar position and the target and determine the deflection. The first two digits of the deflection (DEF) come from the superimposed deflection scale. Remember the LARS rule (left, add; right, subtract); the first two digits are the two numbers that are closest to the 0 of the vernier scale (right side) but does not pass the line. The next (third) number is the number of tick marks that are between the first two digits and the 0 of the vernier scale. The fourth digit is read at the vernier scale. For deflection use the right half of the vernier scale, the first digit is read by starting at the 0 and finding the tick mark on the disk that aligns with one of the tick marks of the vernier scale. The last number of the deflection is the number that coincides with the aligned tick marks.
- To determine the range if using the pivot point as the mortar position, align the plot and simply read the scale for the range. Or lay the edge of the range arm between the mortar position and the target location, aligning the 0 of the range arm with the mortar position, and read the range at the target to the nearest 25 meters. You will soon find, however, that the range arm is not necessary. You can just count the intersecting graph lines.
- The computer receives and applies the observer's corrections. He indexes the observer's direction (which is an azimuth) and places a small triangle under the 0 of the vernier scale at the observer's direction. He then plots the observer's correction from plot No. 1 by moving the number of meters that the observer requests. He marks this plot by circling it and annotating it as No. 2.
  - To determine the new deflection, he

- simply aligns the mortar position and the No. 2 plot and reads the deflection. Then he measures the range with the range arm. (If he is using the pivot point for the mortar position, he simply aligns the plot and reads the range.)
- To add other targets, known points, and reference points (RPs), he uses the same process as the original target plotting method.
- To determine the Angle T, he simply finds the difference between the DOF and the observer's direction.

Because the direction and distance is obtained by a more precise technique, it is important to add that the standards for performing this task should reflect that precision. Accordingly, as a result of developing and using this hipshoot technique, we recommend the following standards of performance:

- Determine direction of fire without error (0 mils).
- Determine mounting azimuth without error.
- Superimpose referred deflection that corresponds to the mounting azimuth.
- Complete computing the mission within two minutes.
- Plot all additional known points, targets, and RPs without error.

I currently use this technique with my soldiers in the 7th Infantry Division, and I have used it on a live fire exercise. Its testimony to accuracy is that mission after mission, little adjustment was required to move the round to a direct hit. On most occasions, both the 81mm mortar squad leaders and the 60mm mortar section sergeants achieved first round suppression with their respective weapon systems. Because I firmly believe that we should train the way we plan to fight, I will continue using this technique and these standards of performance.

Lieutenant Sean M. O'Brien was a mortar platoon leader in the 2d Battalion, 27th Infantry, 7th Infantry Division when he wrote this article. He is a 1988 ROTC graduate of the University of Colorado.

### **TOW Accuracy Training**

LIEUTENANT JOHN S. ZACHAU

Antiarmor training is greatly misunderstood in light infantry units. The TOW missile systems that are available are often underutilized, and the training of the soldiers who man those systems does not always keep pace with the doctrine coming out of the Infantry School.

The 2d Battalion, 27th Infantry, 7th Infantry Division, was tasked to take part in a 1989 TOW accuracy study at the National Training Center (NTC) in California. In preparation for this test event, the battalion developed a training plan that other units may find helpful. Although the program I outline below focuses on light antitank platoons, motorized or heavy units that have antiarmor or Bradley companies and want to concentrate on their TOW accuracy may find it of some value.

The study, directed by the Department of the Army, would test the gunners' accuracy in firing the TOW systems mounted on the improved TOW vehicle (ITV), the Bradley fighting vehicle, and the HMMWV (high mobility multipurpose wheeled vehicle). The tests would be fired under simulated combat conditions that would include artillery, smoke, and timed engagements and put stress on the gunner. The crews would fire real missiles (with the high explosive antitank, or HEAT, warheads removed) at pop-up targets.

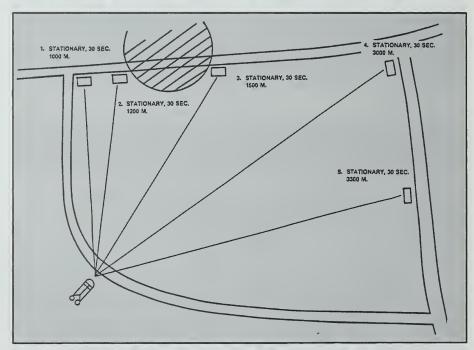
There were several reasons for this test. The major reason was that in TOW accuracy tests at their home stations, TOW gunners were scoring 90 percent accuracy using the M-70 trainer device (tracking board), while at the NTC they were scoring only 15 percent accuracy using MILES equipment.

This noticeable difference could be attributed to many factors, but the success or failure of a TOW unit at the NTC could be partially explained by simulated combat conditions—artillery, CS (tear gas), smoke, heat, and dust while engaging moving targets—that were present during NTC operations.

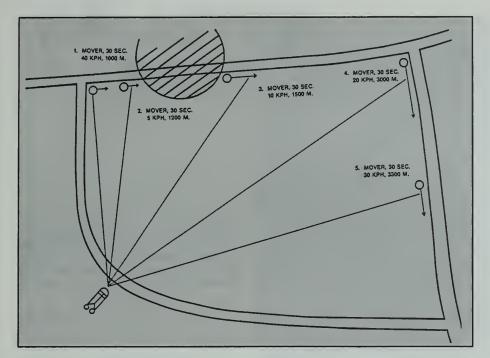
Light antitank platoons are particularly vulnerable because they use the M996 HMMWV with the M-220 TOW system mounted on top. This leaves the gunner and the system exposed to all battlefield conditions, the worst of which are artillery and gas. (There is nothing a TOW gunner hates more than trying to track a target at 2,000 meters while also trying to fit his protective

mask against the eyepiece of the day or night sight.) In addition, the HMMWV platform offers little stability to help the gunner keep the sight crosshairs on his target during a missile's flight.

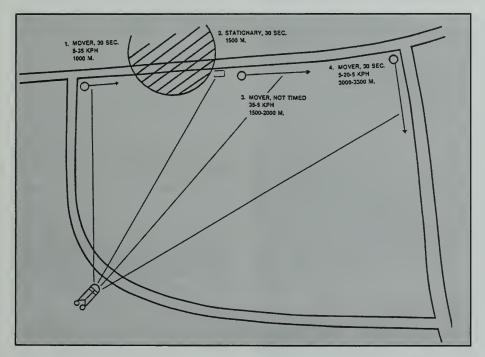
The training plan the battalion developed used MILES under combat conditions against uncooperative targets at maximum ranges of 3,750 meters. (See accompanying diagrams.) It was based on the Infantry School's TOW gunnery tables dated 5 April 1988. These six tables provide a framework for TOW trainers to use to improve the accuracy of their sections and platoons. Table 1 uses the M-70 trainer; Tables 2-5 use MILES; and Table 6 is the advanced qualification table, which will



TOW TABLE II: Part A — Five stationary engagements. This is a six-shot table of stationary target engagements at various ranges.



TOW TABLE II: Part B - Five moving engagements. This is a six-shot table that uses a moving target at various ranges.



**TOW TABLE III: Three moving engagements,** one stationary engagement. This is a fourshot table that combines stationary and moving targets at various speeds and distances out to 3,750 meters.

use the precision gunnery training system (PGTS) when it is fielded.

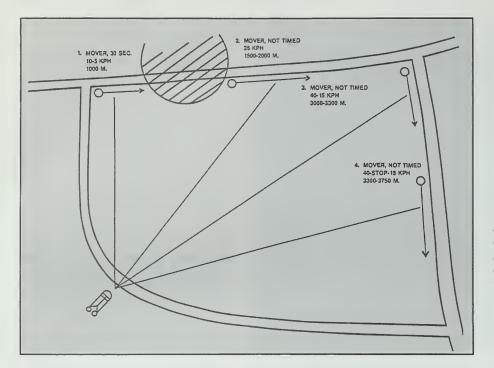
In our battalion's training program, combat conditions were introduced into the accuracy training tables with artillery simulators, CS, and smoke. The squads reloaded missiles and used fire commands in conducting all of the MILES tables. Each squad loaded six MILES missile simulation rounds, each with an ATWESS (antitank weapon effect signature simulator) cartridge, into the missile storage racks and

prepared to track a HMMWV that was being used as the target vehicle.

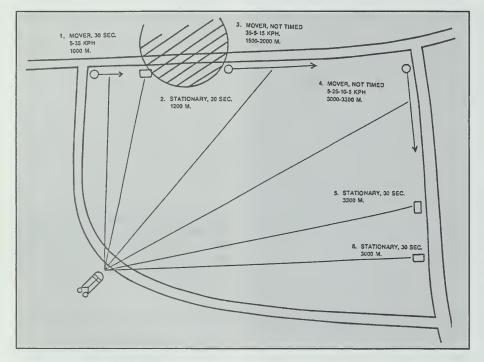
The target HMMWV was down range and began to move at the various speeds and distances the table required. A gunner engaged the vehicle without knowing when artillery or gas might be introduced into the scenario. In the preliminary tables, a gunner had to score 80 percent or more to advance to the next table. During Table 5, two to four artillery simulators and one CS or smoke grenade were used near his

position to duplicate enemy indirect fire. (The smoke must be placed where it will obscure while still being diffused enough to allow the MILES lasers to penetrate it.)

Although all of the MILES tables in this training program could be fired at moving silhouette or scaled targets, the advantage of shooting at a moving target vehicle at realistic distances was that the target could be uncooperative. It could head for the system's deadspace, and its movements could be controlled



TOW TABLE IV: Four moving engagements. This is a six-shot engagement that focuses on uncooperative moving targets at speeds of 5 to 45 KMH; they accelerate and decelerate moving out to the maximum engageable distance.



**TOW TABLE V: Three moving engagements;** three stationary engagements. This is a sixshot standard qualification table using MILES. It combines all elements of the previous tables.

by radio to offer a target that accelerated and decelerated. The movement also stirred up dust, a natural obscurant, and this made it difficult for the gunner to track the vehicle at actual ranges.

The goal of this training was to achieve realism, because training in a sterile environment has little value. The execution of the accuracy tables leading up to qualification on Table 5, combined with combat replication, proved to be a good training technique. It gave trainers an excellent assessment of how well the gunners and squads could perform under the stressful conditions they could expect to face in combat.

Lieutenant John S. Zachau has served as a light infantry platoon leader, an antitank platoon leader, and a company executive officer in the 2d Battalion, 27th Infantry. He participated in Operation GOLDEN PHEASANT, Operation JUST CAUSE, and more recently in Operation DESERT STORM.

# ENLISTED CAREER NOTES

### TRAINING FOR **PROMOTIONS**

Because the courses in the Noncommissioned Officer Education System (NCOES) are linked to promotion, commanders must see that their soldiers are scheduled for and attend the appropriate schools.

As a result of Operation DESERT STORM, many soldiers had to be deferred from attending the courses they need, and it will take about a year to clear this backlog. PERSCOM needs the support of all commanders in allowing their soldiers to attend the critical courses, including those who redeployed following DESERT STORM.

Scheduling soldiers to attend combat arms NCOES courses is a decentralized procedure. Each major command is responsible for establishing a priority list for training. As the Order of Merit List (OML) is created, the soldiers in the primary zone for promotion selection must be placed at the top of the list.

Scheduling for combat support and combat service support Basic NCO Course (BNCOC) attendance is handled through the BNCOC Automated Reservation System (BARS) report. The priority for scheduling is staff sergeant, sergeant (promotable), and sergeant.

This priority system will ensure that each soldier receives training at the proper time and that no soldier is denied a promotion opportunity.

All soldiers who were denied training because of Operation DESERT STOR M

have been identified and will be monitored to ensure timely scheduling for training. To ensure that soldiers are scheduled when they are redeployed, commanders at all levels must notify PERSCOM when these soldiers are available for training.

Soldiers deferred from attending the Advanced NCO Course (ANCOC) and the U.S. Army Sergeants Major Course (USASMC) have been identified and will be scheduled for the first available classes after their redeployment. Installation officials must notify PERSCOM of the availability of their soldiers.

Soldiers in the zone of consideration for promotion to sergeant first class and master sergeant who were deferred from attending the prerequisite NCOES course solely because of Operation DESERT STORM will be identified to the appropriate selection board.

### **SOME AERS ARE NOW** SEPARATE EVALUATIONS

Academic Evaluation Reports (AERs) received for permanent-change-ofstation (PCS) schools of 20 weeks or longer for NCOs, sergeants through command sergeants major, have always been filed on their official military personnel files (OMPF). But these AERs were not included in the time accounting sequence with NCO evaluation reports (NCO-ERs).

This meant that the long period of time an NCO spent in one of these schools had to be reflected as non-rated time on his next evaluation report. Depending on the length of the school, leave taken, and the like, he might have to be given an annual evaluation report within three months after arriving at his new duty station or unit.

Effective with classes that graduated in January 1991, the AERs for these long-term schools will still be filed in the NCOs'OMPFs, but will be processed in sequence with their NCO-ERs. This means that an NCO's next NCO-ER period begins after his graduation from the school, not the month after his last NCO-ER. The AER will stand as a separate evaluation period between his last and his next NCO-ER.

This change will give raters a longer period of time to observe an NCO's performance before preparing his next NCO-ER. It will also give the rated NCO a more meaningful rating period in which to learn and grow, and demonstrate his abilities.

AERs received for temporary duty courses and PCS schools of less than 20 weeks will not count as separate evaluation periods and will continue to be reflected as non-rated time on the next NCO-ER.

Details and procedures are in MILPER message number 91-58, Processing Academic Evaluation Reports. This change will also be included in the next update of AR 623-1, Academic Evaluation Reporting System, and AR 623-205, Noncommissioned Officer Evaluation Reporting System.



# OFFICERS PAREER NOTES

### WHERE DO I STAND? SENIOR RATER PROFILE

One of the questions most frequently asked of Infantry Branch is "How do I really stack up against my peers?" In virtually every case, the officer asks this question because he has no idea what his senior rater's profile is. In a few cases, the officer doesn't understand the center of mass concept or that a profile of the senior rater's cumulative block checks is applied on the back of each OER when it arrives at PERSCOM.

An officer's standing is determined by his position in the senior rater profile. The center of mass concept is based on the assumption that within a given population of officers, there is a majority of relatively equal performers (center of mass), a few whose performance is clearly better than that of the majority (above center of mass), and a few others whose performance is clearly not as good as that of the majority (below center of mass).

It is the senior rater who is responsible for making this tough call, and he does so by creating a profile of the officers he rates. This profile reflects his evaluation of the individual officers' potential and performance. A perfect bell curve profile doesn't magically appear the minute a battalion commander prepares a senior rating for one of his officers. His senior rater profile develops over time, as he rates more and more officers. This is why some profiles have very few officers in them. In these cases the profiles are considered "immature," and the senior rater's narrative becomes the critical item in conveying his evaluation of an officer's standing. Ideally, after several ratings, his profile matures into one that clearly portrays whether an officer he rates is running with, behind, or ahead of the pack.

An officer who wants to find out

what his current senior rater's profile looks like should either contact the adjutant, who may keep track of it, or ask the senior rater himself. Additionally, personnel technicians at Infantry Branch can provide information by telephone on an officer's latest three OERs. This subject is also one that makes a worthwhile topic for officer professional development — one that is guaranteed to keep the attention of the audience.

Finding out where you stand in previous senior rater profiles is as simple as requesting a copy of your performance microfiche. To request yours, write to Headquarters, PERSCOM, ATTN: TAPC-MSR-S, Alexandria, VA 22332. Along with your request, include your rank, name, Social Security number (SSN), and mailing address. You should receive the microfiche in about three weeks.

Another topic worth mentioning is your responsibility for reviewing each OER before signing it to make sure it is administratively correct. It is imperative that you make sure your name and SSN as well as those of your rater and senior rater are correct. Also verify your duty title and description, your height and weight figures (they should match those on your ORB), and the data on your Army Physical Fitness Test (APFT).

A special note to officers who are promotable: If the rank indicated in Part I.c of your OER has a "P" after it, the profile for the next higher grade will be applied to the report. Rated officers and senior raters need to be certain that the intent is to have the profile for the next higher grade applied to a report if there is a "P" after the rated officer's rank.

Your senior rater's profile is probably the key element in determining where you stand with respect to your peers. If you have further questions regarding profiles, their interpretation, or your standing in a profile or overall, please call your assignment officer.

### OFFICIAL PHOTOGRAPHS

Promotion and selection boards review three items in each officer's file - his officer record brief (ORB), his microfiche, and his photograph. A recent, high quality photo is extremely important; it is an officer's handshake with the board. Nevertheless, there is a continuing problem with the quality and timeliness of the photos in officers'

As strange as it may seem, photos have arrived at PERSCOM with such errors as the following: U.S. and crossed rifles switched on the lapels, and officers wearing jump boots, grossly wrinkled uniforms, and even overshoes.

While these are the extremes, more than 40 percent of the photos could be better. The most common errors are green leadership tabs, the Infantry cord, incorrect wear of awards and decorations (uneven, not properly placed), improper fit or appearance of uniform (wrinkled, too small, too short, pockets/lapels not taped down, poor crease in trousers), poor haircuts, incorrect rank, and outdated photos. Although photos are considered current if they are within the past five years, officers are encouraged to have a photo taken every three years and after each promotion.

Prepare for your photo session by properly preparing your uniform and having someone double check it. Don't be afraid to get the regulation out. Take someone with you to the photo lab to make sure you look good. Otherwise, you will have to depend upon the photographér, and he always has a lot of other things to do. Then, check your photo before it is forwarded. If at all possible, get an extra copy and send it directly to Infantry Branch.

If you are a commander, you can help your officers in this area by requiring each to show you a copy of his photo. Look at the date of the last photo on his ORB. And don't hesitate to point out any errors.

Feedback from promotion and selection boards clearly indicates that boards use an officer's photograph to formulate opinions and make decisions. A current photo of high quality tells a board a great deal about an officer; it shows that officer has an interest in the results of the board. It is well worth any officer's time to make sure his photo presents the best possible image.

### **USAREC BATTALION COMMAND**

The FY 1992 U.S. Army Recruiting Command (USAREC) selection board for battalion command will convene in September 1991 for assignment between January and June 1992. Officers who are interested should contact Infantry Branch as soon as possible to express their desire to compete and their preferences for location.

The battalions to be slated by this board are those in Los Angeles, CA; Denver, CO; Jacksonville, FL; Atlanta, GA; Des Moines, IA; Brunswick, ME; Minneapolis, MN; Jackson, MS; Kansas City, MO; Albuquerque, NM; Raleigh, NC; Cincinnati, OH; Philadelphia, PA; Columbia, SC; and Nashville, TN.

Infantry Branch must provide two former battalion commanders and four additional lieutenant colonels. Any officer who is interested should obtain the concurrence of his chain of command before volunteering for one of these assignments.

### ROTC PMS BOARD

An ROTC Professor of Military Science (PMS) board is tentatively scheduled to meet in October 1991 to select officers to fill positions beginning in academic year 1992. Although a formal list of schools is not yet available,

positions requiring lieutenant colonels and majors are anticipated.

The primary requirements for PMS duty are a master's degree, a competitive assignment history, and at least two years time on station by the summer of 1992.

Interested officers should contact Infantry Branch for more information.

### PROJECT JUMPSTART

Because of the important role the U.S. Army Reserve and Army National Guard play in the total Army mission, we send some of our best and brightest officers to the readiness groups, where they work to improve reserve component training and operational readiness.

The officers assigned to readiness groups provide a valuable link between the reserve forces and the Active Army in terms of current doctrine and training techniques. This relationship establishes a bond between the two components and reflects the nation's commitment to the Total Army concept.

Many officers have been assigned to readiness groups under Project Jumpstart. This program has increased the warfighting capability of the Reserve Components by assigning highly qualified captains and majors to serve as advisors for two or three years.

Jumpstart officers who have had recent experience in computer simulation exercises or who have been through a rotation at one of the combat training centers are proving valuable to the Reserve Component commanders preparing to undergo this type of training.

As force modernization continues, Jumpstart officers are also conducting new equipment training, which is leading to more efficient equipment transitions.

Through their professionalism and dedication, these officers have a significant effect on the Army's operational readiness.

### JOINT STAFF INTERN PROGRAM

The Joint Staff Intern Program gives a small number of junior officers of all services a chance to participate as action officers on the Joint Staff (JS) in support of the Joint Chiefs of Staff (JCS) and the Chairman, Joint Chiefs of Staff (CJCS) for periods of up to one year.

If you are interested, you must meet the following non-waivable requirements:

• Rank of captain. (You may be promotable provided you will not be

### INFANTRY BATTALION COMMAND

As the Army's structure changes, the opportunity for lieutenant colonel level command decreases. Below are the

command opportunities projected for the Infantry category through the end of FY 1993.

Fifty-seven battalions are being slated in FY 1992, and we expect 58 battalions to be slated in FY 1993.

CENTRALLY SELECTED						
Mechanized Light Airborne Air Assault	26 27 11 11	Motorized Training Special Troo JSA	3 34 os 2 1			
NOT CENTRALLY SELECTED						
UNIT 1st Bn, lst Inf TF Lion (BCT) 1st Bn, 509 Inf (Abn)		LOCATION USMA Ft. Jackson JRTC	CHANGE OF COMMAND June 1993 June 1993 June 1993			

promoted to major during your one-year tenure.)

- Be eligible for a Top Secret/SCI security clearance. A Secret clearance is acceptable, pending a background investigation.
- Be an official nominee; that is, PERSCOM must have nominated you for consideration.

You need to be aware that, because this is a joint service assignment, the selection process is extremely competitive.

You begin this process by contacting Infantry Branch at PERSCOM and expressing your desires to your assignment officer. Although the assignment officer may not know when the next scheduled vacancy will occur, he can obtain this information from the Joint Management Office in PERSCOM. The Joint Staff J-1 continually requests nominations from the services and there is no good or bad time to request consideration. Keep in mind, too, that Infantry Branch must coordinate your follow-on assignment well in advance of any desired report date.

The assignment officer conducts a quick screen of your branch file to determine whether you meet the internal Infantry Branch and PERSCOM criteria for nomination. While these criteria are somewhat subjective and are not spelled out in any regulation, they have remained relatively constant through

the years and will serve as a useful benchmark in determining your competitiveness. As you review your Officer Record Brief (ORB) in preparation for calling Branch, consider the following criteria:

Manner of Performance. Performance may be the single most important factor in your competitiveness, and you can determine this by reviewing your OERs. Obviously, "top block" ratings with solid senior rater profiles make you competitive. The assignment officer can also give you an evaluation of this element and make recommendations.

Branch Qualification. Infantry Branch will verify that you are branch qualified and, if you are, will review your command OER to determine your manner of performance. This OER is significant in determining your competitiveness for the program as well as subsequent career milestones such as your promotion to major and selection for the resident Command and General Staff College (CGSC). If you have not commanded, the assignment officer will not nominate you for an intern position. Instead, he will suggest an assignment that will enable you to become branch qualified, and this is in your best interest.

Career Timeline. You must consider how an intern position will fit into your overall career timeline. Each officer has blocks of time in which to achieve career goals — company command, CGSC (resident or nonresident), battalion XO or S-3 time, battalion command. The occurrence of these blocks varies depending on an officer's year group. The assignment officer is familiar with these "windows" and will advise you and make recommendations.

Follow-on Assignment. Your potential assignment after the one-year internship will be a consideration in determining your eligibility to compete. Unless you are already serving in the Washington area, the rules for time-on-station will mean that you will remain in Washington following the internship and likely work in your functional area in another agency or on the Army Staff.

Assuming you elect to compete for an internship and your assignment officer concurs, the next step is for Infantry Branch to forward your packet to the JMO for consideration. This packet consists of a cover sheet from your branch chief, your ORB, possibly a photograph, and your last five OERs. If the JMO concurs with the Branch recommendation, the packet will be forwarded through channels to the Joint Staff, J-1 for consideration. The J-1 will forward your packet to a directorate (J-3, J-5) for final consideration.

(This item was contributed by CPT Anthony R. Garrett, Springfield, Virginia.)



### BOOK REVIEWS



Once again we have a number of interesting publications to tell you about:

• FORWARD INTO BATTLE: FIGHT-ING TACTICS FROM WATERLOO TO THE NEAR FUTURE. Second Edition, Revised and Updated. By Paddy Griffith (Presidio Press, 1991. 228 Pages. \$24.95). When the first edition of this work appeared in 1981, it had the unfortunate experience—at least in U.S. military circles—of being overshadowed by a somewhat similar book on infantry tactics. At the time, it deserved far better treatment from U.S. Infantrymen. Hopefully, this new edition will attract a larger audience, although the recent events in Southwest Asia will undoubtedly be used as ammunition by the author's critics.

The author has one major objective — "to analyze the continuous development of the minor tactics and weapons of land warfare from Napoleonic times to the near future, not forgetting the often misleading interpretations that have been placed upon it by analysts and historians." He accomplishes his mission.

Underlying the author's various theses is the belief that no matter the nature of the next war, "training, unit cohesion and military professionalism" of the highest order will be required, particularly from those who will engage in close combat. And no matter the advances in technology, the author believes there will be close combat, in which "groups of soldiers come face to face across 'no-man's-land': the lethal but crucial area where the outcome of combat is decided."

All Infantrymen are urged to read this book. It offers much for them to think about.

• OPERATION JUST CAUSE: THE U.S. INTERVENTION IN PANAMA. Edited by Bruce W. Watson and Peter G. Tsouras (Westview Press, 1990. 245 Pages. \$29.95, Softbound). In this book, 15 essayists, all but one of whom has a close connection with a U.S. Government agency, present their thoughts on Operation JUST CAUSE—its background, the operation itself, and the aftermath. Several of the essays are quite short, others are relatively long; most cover six to seven printed pages. All are based principally on secondary sources, with U.S. newspaper and periodical citations predominant.

Although the essays are uneven in both length and content, all are worth reading, even though on occasion a hint of disapproval of U.S. actions comes through. Infantrymen will be particularly interested in Lorenzo Caldwell's "The Anatomy of JUST CAUSE: The Forces Involved, the Adequacy of Intelligence, and Its Success as a Joint Operation."

Airborne enthusiasts should welcome these two books:

- USA AIRBORNE 50th ANNIVER-SARY. Bert Hagerman, Editor (Turner Publishing Company, P.O. Box 3101, Paducah, KY 42002-3101, 1990. 512 Pages. \$55.00). Big, bold, beautiful the only words we can think of at the moment to describe this book. It has a tremendous amount of information between its covers, as well as numerous photographs, colorful patches and insignia of various kinds, charts and tables, plus information on the Rangers, the First Special Service Force, and Special Forces.
- THE ALL AMERICANS: THE 82d AIRBORNE. By Leroy Thompson (A David and Charles Book. Sterling, 1990. 192 Pages). The author traces the comings and goings of the division from its early days as an Infantry unit in World War I to the end of 1987. He supplements his narrative with numerous photographs and colorful insignia layouts. The book also has several appendixes, a bibliography, and an index, all useful features.

Armor enthusiasts, as well as members of the 24th Infantry Division, will want to look at:

• THE ARMORED FIST. By the Editors of TIME-LIFE Books (TIME-LIFE Books, 1990. 176 Pages. \$14.99, plus shipping and handling). This is the first in a planned 24volume series titled THE NEW FACE OF WAR. After a brief introductory chapter, it discusses the great tank battles of the 1973 war in the Middle East, the training and eventual movement of the 24th Infantry Division to Southwest Asia, the National Training Center, antiarmor weapons and their employment, and modern tanks and their capabilities and limitations. Lots of photographs and drawings enliven the text, while the bibliography and the index are valuable aids.

In our last issue, we called your attention to a publication from GDW Games titled THE DESERT SHIELD FACT BOOK: FACTS ABOUT THE CRISIS. That publication appeared before the air and ground phases of the war in Southwest Asia had been completed. Now, GDW Games has produced a new publication that builds on the earlier one and covers the war from beginning to end: GULF WAR FACT BOOK. By Frank Chadwick (GDW Games, P.O. Box 1646, Bloomington, 1L 61702-1646, 1991. 104 Pages. \$10.00, Softbound). In addition to a fast-moving narrative, it contains a number of excellent maps, tables, charts, and drawings. The narrative offers a background study; information on the opposing forces and their equipment and the air and ground campaigns; and a discussion of AirLand Battle doctrine. In the last chapter, the author presents his thoughts on why things happened as they did and the important role realistic training by the U.S. forces played in the final outcome.

There are several other publications we want you to know about:

- SOVIET MILITARY POWER 1990. Ninth Edition, U.S. Department of Defense (USGPO S/N 008-000-00565-6. 111 Pages. \$6.50, Softbound). Recognizing the tremendous changes that are occurring in the Soviet Union today, the compilers of this annual publication admit that any assessment of Soviet power has become far more difficult than in the past. Still, they feel that "the military might of the Soviet Union is enormous and remains targeted on the United States and its allies." They also believe that this will not change in the foreseeable future and offer their assessments of that might for our edification. The compilers discuss such subjects as general purpose forces and the U.S.-Soviet balance, Soviet foreign policy, space programs, strategic defenses, and the prospects for the future.
- AMERICA'S NATIONAL BATTLE-FIELD PARKS: A GUIDE. By Joseph E. Stevens. Maps by Beth Silverman. (University of Oklahoma Press, 1990. 352 Pages. \$29.95). This fine publication is divided into 38 chapters, one for each battlefield park administered by the U.S. National Park

Service, and contains 52 maps plus 80 illustrations. Each chapter tells the story of a particular battle and contains detailed, self-guided walking and automobile tours keyed to the Park Service's numbered tour maps. Military history in this country has not been better served.

• WEAPONS: AN INTERNATIONAL ENCYCLOPEDIA FROM 5,000 B.C. TO 2,000 A.D. (The Diagram Group [London]. St. Martin's Press, 1990. 336 Pages. \$27.95). This outstanding work, first published in the United States in 1981, has been accepted by many as the most comprehensive onevolume illustrated reference on the history of weaponry from the earliest times to the present, and slightly beyond.

This edition is a completely updated version of the original with more than 2,500 illustrations of a representative selection of all types of weapons from all ages and cultures. It also has a new 16-page chapter covering the key developments in the field of weaponry since 1981. All indexes and tables and the bibliography have been updated. It is well to keep in mind that the book's emphasis is on weapons used for combat between human beings. Those used for the hunting of animals or for recreation are generally excluded. Infantrymen should relish this one.

• WINCHESTER: AN AMERICAN LEGEND. By R.L. Wilson. Photography by G. Allan Brown. (Random House, 1991. 404 Pages. \$65.00). The author is considered the most knowledgable expert on the history of American arms. In this beautifully puttogether book, he presents the authorized history of the company and its products from 1849 to the present. This book is a companion volume to his COLT: AN AMERICAN LEGEND, which was published several years ago.

In addition to discussing the Winchester line and its accessories and ammunition, he includes a chapter ai:ned specifically at the collector and an appendix that lists serial numbers and years for all models. There are more than 300 full-color photographs and more than 110 black-and-white photographs and illustrations. This is another book Infantrymen should relish.

Here are a number of our longer reviews: THE WAR IN SOUTH VIETNAM: THE YEARS OF THE OFFENSIVE, 1965-1968. By John Schlight (Office of Air Force History, United States Air Force, 1988. USGPO S/N 008-070-00612-0. 452 Pages. \$24.00). Reviewed by Lieutenant Colonel Jack Mudie, United States Air Force Retired.

This latest volume in a series of official histories on the air war in Southeast Asia focuses chiefly on the U.S. Air Force's actions in South Vietnam. Later volumes in the series will cover activities in Laos and over North Vietnam.

The author, a retired U.S. Air Force officer and a teaching historian, has done a fine job of presenting, chronologically, the growth of bases, equipment, and personnel to accomplish the Air Force's missions. Close air support of ground combat operations and the airlift of supplies and troops were the two principal missions, and their development and execution are thoroughly described. Other missions - such as defoliation, psychological warfare, reconnaissance, and intelligence - are also described but in less detail.

The constant struggle for overall control of air assets was never resolved to anyone's satisfaction, and the author carefully tries to present all sides of the competing arguments. He also discusses fairly such interservice problems as the Air Force and Marine Corps differences over the control of tactical fighters and the Army and the Air Force differences on the dedicated use of the Caribou aircraft.

The author concludes that, within the Air Force itself, the Southeast Asian experience has resulted in a major modification of the balance between strategic and tactical air power in an effort to provide more effective deterrence at all levels of conflict instead of depending upon strategic air power alone.

The book is well illustrated and contains detailed charts of the Air Force's order of battle in South Vietnam from 1962 through 1968. It is, overall, an excellent reference document.

DRAWING THE LINE: THE KOREAN WAR, 1950-1953. By Richard Whelan (Little, Brown, 1990. 379 Pages. \$24.95). Reviewed by Lieutenant Colonel Donald C. Snedeker, United States Army.

The United States, it seems, has rediscovered the Korean War. And with the recent acknowledgment of the 40th anniversary of the start of our most misunderstood war, we have been exposed to a flood of books, magazine articles, and television reports, all of which have tried to clear up the misunderstandings.

Did the U.S. lose the Korean War? Why did the U.S. lose the Korean War? Why didn't we see that Red China was about to enter the war? Why didn't we learn the "real" lessons from Korea and thus prevent the Vietnam War?

Korea was indeed a crucial event in the history of the U.S. policy of containment — perhaps the crucial event. In any case, it was in Korea in June 1950 that the U.S. decided to draw the line and put "godless" communism on notice that the West was not going to sit idly by and accept naked aggression without a whimper.

Today, as we watch the policy of containment come to fruition as the Cold War dies, it is important to return to that singularly important event. As we move further away from the Korean War itself and put it in the context of the entire Cold War containment era, it appears more and more that Korea — instead of being the first war the U.S. lost — was one of the battles we won (although not necessarily in the traditional sense) along the way to victory in the Cold War.

This book will help a reader put the war into the right context. Getting there, however, may be too bumpy a road for some, because much of the author's analysis is fairly radical. For example, he proposes that it was the U.S. demand for Japan's unconditional surrender in World War II that led to the Cold War; that the Marshall Plan prevented Korean reunification; and that President Truman's decision to allow air and naval action north of the 38th Parallel made it "inevitable that sooner or later U.S./UN/ ROK forces would, if they could, invade North Korea with the goal of uniting the entire peninsula. . . ."

But once a reader gets past the inflammatory rhetoric and the equally inevitable comparisons between Korea and Vietnam (which were, after all, both in Asia), the book provides an excellent analysis of the political and military events surrounding the Korean War. More important, the book puts into a proper context the meaning of those events.

For those who think the Korean War is an uninteresting relic of a by-gone era, the words of John Foster Dulles ring as true today as they did when they were written on I4 July 1950: "Neither equity nor good sense dictates that an unprovoked act of aggression should occur without risk of loss to the aggressor. If there can be armed aggression under conditions such that failure involves no permanent loss, then that puts a premium on aggression." Sound familiar?

MELTING POT SOLDIERS: THE UNION'S ETHNIC REGIMENTS. By William L. Burton (Iowa State University Press, 1988. 282 Pages. \$29.95). Reviewed

### by Major Don Rightmyer, United States Air Force.

Most of the North's fighting forces during the Civil War were made up of volunteers, either called up in the early days by the individual states in response to President Lincoln's initial request for troops or in later years in response to the need for additional units and replacements.

This book takes a look at a special type of military unit within the Union army — those that were unique because they were filled almost completely with troops from one particular ethnic group. The author first examines the history of European immigration into the United States during the early 19th century, and focuses on three ethnic groups that had a significant effect on the social and political life of the country at the time: the Irish, the Germans, and the Scandinavians.

Most of the book is devoted to the author's examination of how these ethnic groups confronted the Civil War crisis and molded themselves into the Northern war effort. He provides interesting information on the recruiting methods used to get the men into the ranks and something of the culture they brought to the daily life of the Northern soldier.

The author also examines the military performance and battle records of the various ethnic units that saw active service in the various theaters of operations. While a few of these units had special names, most carried numerical designations.

Although this is a somewhat specialized book because of its subject and focus, it does provide an interesting look at the Civil War from the viewpoint of the ethnic Northern soldiers. It is definitely a worthwhile historical study.

BENEDICT ARNOLD: PATRIOT AND TRAITOR. By Willard S. Randall (William Morrow, 1990. 667 Pages. \$27.95). Reviewed by Lieutenant Colonel Cole C. Kingseed, United States Army.

This is the first major biography in 35 years of our country's most famous traitor. It is the story of one of the most complex figures of the American Revolution, and prize-winning journalist Willard Randall has produced the most comprehensive biography of Arnold yet written.

By all contemporary accounts, Arnold was the best fighting general on the American side during the first three years of the war, and the author explains why he was held in such wide esteem. Unfortunately,

Arnold felt he never received the recognition and fame he deserved — and sought. Too, he faced court-martial proceedings for the misuse of his office and received a written reprimand from George Washington for his "peculiarly reprehensible" conduct.

Starting a secret correspondence with British authorities in 1779, Arnold soon stepped out along the trail of treason and conspiracy that ultimately led in 1780 to his attempt to deliver West Point and Washington himself to the British.

The author presents a sympathetic portrait of his subject and sheds new light on Arnold's treachery, including the significant role played by Arnold's wife, Peggy Shippen. His book, which is likely to become the definitive biography of Benedict Arnold, is very much recommended to all who are interested in the American Revolution.

THE ANGLO-AMERICAN WAR WITH RUSSIA, 1918-1919. By Benjamin D. Rhodes (Greenwood Press, 1988. Contributions in Military Studies Number 71. 192 Pages. \$35.00). Reviewed by Chris Timmers, Charlotte, North Carolina.

When a country's political leaders elect to fight a war on unfamiliar terrain with less than first-rate troops whose mission is vague, failure almost seems to be a foregone conclusion. If one adds that those troops will be part of a multi-national force under the command of an officer from another country, failure then seems to be guaranteed. In a winter campaign in Northern Russia from May 1918 to mid-1919, more than 200 U.S. soldiers (and more than 300 British soldiers) died to affirm what, in historical hindsight, seems so obvious.

In early 1918, the Allies had reason to be worried about Russia. The Kerensky provisional government had been overthrown by the Bolsheviks in October 1917, and had taken Russia out of the war against Germany. This, in turn, permitted Germany to shift to the west huge numbers of troops and quantities of materiel. Too, the Allies feared that the considerable amount of military stores they had sent to Russia might be seized by Germany.

The British government, which favored intervention in Northern Russia by way of Murmansk and Archangel, successfully drew the United States in and by June 1918 an entire U.S. infantry regiment with supporting elements were on their way to Archangel. What then occurred during the next 12 months is, by now, almost standard lore in the history of winter warfare,

especially winter warfare in Russia: severely cold temperatures, incredible physical hardships, non-functioning or poorly functioning weapon systems because of the arctic-like weather, and atrocities committed by both sides.

The author's narrative strength is not so much in his explanation of the U.S. involvement in the expedition but in his explanation of U.S. failure. His work is a truly scholarly one, and this is an age when that adjective has been misused and abused many times over.

But a scholarly work is not for all readers. This one should be read not only to gain an understanding of a somewhat obscure World War I theater of operations, but also to gain a better appreciation of the history of U.S.-Soviet relations.

Is there anything wrong with the book? Two things, neither serious. First, the index could have been more comprehensive. And second, for some reason known only to the publisher, the book is printed in a typewriter typeface that gives it a college term-paper appearance. Reading page after page of typewritten script can be quite tiring.

For serious students of military history, though, this book is indispensable. If you are a casual reader, leave it alone.

COMPANY COMMAND: THE BOTTOM LINE. By Colonel John G. Meyer, Jr. (National Defense University Press, 1990. USGPO S/N 008-020-01178-9. 235 Pages. \$6.50, Softbound). Reviewed by Captain Duane L. Smith, United States Army.

The author, a serving U.S. Army officer, is well qualified to write this kind of book. He has commanded at both company and battalion levels and has been selected for brigade command. But he did not rely only on his own experience; he conducted numerous interviews during a two-year period with other officers who had commanded companies.

He has organized his book so that it can be used as both a learning and a reference tool. It summarizes the important things a company commander must accomplish if he is going to complete a successful command tour. It is divided into functional areas—training, military justice, maintenance, supply, administration, and the like. In each area, the author offers examples of hypothetical and actual situations, practical tips, quotations from respected military leaders, a discussion of how to deal with important issues, a summary, and references to essential Army publications.

Overall, this book is a valuable resource that can be used as a textbook in all advanced courses and in an installation company commander's course. It is equally useful in battalion and brigade officer professional development classes for stimulating discussion on this most important subject.

GENERAL REINHARD GEHLEN: THE CIA CONNECTION. By Mary Ellen Reese (George Mason Unversity Press, 1990. 240 Pages. \$19.95). Reviewed by Captain Rick Ugino, United States Army National Guard.

In the years since the end of World War II, no topic seems to have stirred U.S. passions with the same fervor as the supposed protection given by Allied intelligence agencies to former Nazi party members and former German officers. In this well-researched and well-written book, the author tells the complete story of one of the most successful of these "protectees" - General Reinhard Gehlen, the "father" of the West German BND, or Military Intelligence Service.

Gehlen successfully negotiated himself and many members of his former team, who had concentrated on gathering intelligence about the Soviet armed forces during the war years, into U.S. employment, after the British refused his offer. Perhaps their lack of hard data on the Soviets caused the U.S. agencies involved to take in Gehlen. although he does deserve credit for his foresight and brilliance in crafting a new German military intelligence organization.

As the author puts it, "Americans looked at Gehlen as an Intelligence asset.... Gehlen was looking at a broader picture, a picture of post-war Germany in a new Europe."

This book makes for most interesting reading. Of particular interest is the author's description of Gehlen's Vatican contacts. The book's only drawback is the abundance of discursive footnotes; much of the material in them would have been better served if it had been incorporated into the author's narrative.

It is fascinating and reads like a good spy thriller.

ASHES TO ASHES: THE PHOENIX PROGRAM AND THE VIETNAM WAR. By Dale Andrade (Lexington Books, 1990. 331 Pages. \$22.95). Reviewed by Doctor Joe P. Dunn, Converse College.

Few aspects of the Vietnam War are as

little understood and inspire as much emotion as the Phoenix Program. Myths, charges, and misinformation about the program abound. Most of what has been written about it generates more heat than

Thus, this first serious and systematic study of the program is an important and fascinating contribution to the war's literature. The author is a military historian who specializes in special operations; he only recently joined the Army's Center of Military History.

The book traces the evolution of Phoenix, its various forms of operations, successes and failures, frustrations and errors, zenith and demise, and its effect on the war. The author's perspective is clear: Phoenix was an absolutely necessary approach to tackling the serious problem posed by the Viet Cong infrastructure, and it did enjoy considerable success in its counterinsurgency effort.

The informative and important narrative keeps the reader spellbound throughout. Along with the recently published Slow Burn: The Rise and Bitter Fall of American Intelligence in Vietnam, by Orrin DeForest and David Chanoff, it is one of the more significant books to come out on the war as we begin to gain a truer understanding of the role of intelligence and special operations during the conflict.

### RECENT AND RECOMMENDED

THE COMANDANTE SPEAKS: MEMOIRS OF AN EL SALVADORAN GUERRILLA LEADER. Edited by Courtney E. Prisk. Westview Press, 1991. 145 Pages. \$25.00, Softcover.

THE MULTINATIONAL FORCE IN BEI-RUT, 1982-1984. Edited by Anthony McDermott and Kjell Skjelsbaek. Florida International University Press, 1991. 293 Pages. \$29.95.

THE REGIMENT: LET THE CITIZENS BEAR ARMS! By Harry M. Kemp. Eakin Publications (P.O. Box 90159, Austin, TX 78709-0159), 1990. 395 Pages. \$24.95.

THE MEXICAN WAR JOURNAL AND LETTERS OF RALPH W. KIRKHAM. Edited by Robert Ryal Miller. Texas A&M University Press, 1991. 141 Pages. \$34.50.

BEYOND THE THAW: A NEW NATIONAL STRATEGY. By S.J. Deitchman. Westview Press, 1991. 258 Pages. \$49.95.

THE MARCH OF THE MONTANA COLUMN: A PRELUDE TO THE CUSTER DISASTER. By Lieutenant James H. Bradley, edited by Edgar I. Stewart, with a new foreword by Paul L. Hedren. Originally published in hardcover in 1961. University of Oklahoma Press, 1991. 216 Pages. \$9.95, Softcover.

FIRST ACROSS THE RHINE: THE 291st ENGINEER COMBAT BATTALION IN FRANCE, BELGIUM, AND GERMANY. By Colonel David E. Pergrin, with Eric Hammel. lvy Books. A reprint of the 1989 hardcover edition. Ballantine Books, 1990. 347 Pages. \$4.95.

PRINCIPAL FOREIGN DEFENSE SYS-TEMS PRODUCERS, 1990-1991. Edited by R. Noyes and D.J. DeRenzo. Noves Publications (Mill Road at Grand Ave., Park Ridge, NJ 07656), 1990. 335 Pages. \$72.00, Softbound.

DIARY OF THE AMERICAN WAR: A HESSIAN JOURNAL. By Captain Johann Ewald. Yale University Press, 1979. 467 Pages.

A WILDERNESS OF MISERIES: WAR AND WARRIORS IN EARLY AMERICA. By John E. Ferling. Greenwood Press, 1980. 227 Pages. \$25.00.

VIETNAM MEDAL OF HONOR HEROES. By Edward F. Murphy. Ballantine Books, 1990. 276 Pages. \$4.95, Paperback.

WAR DEFENCE ALMANAC: THE BAL-ANCE OF MILITARY POWER. Monch Publishing Group, 1990. 272 Pages. \$6.00, Softbound.

DEFENSE ELECTRONICS AND COM-PUTING. Number 4. Editorial Supplement to the December 1989 issue of INTERNATIONAL DEFENSE REVIEW. Jane's Information Group, 1989. 32 Pages, Softbound.

EUROPEAN ARMS CONTROL: PROB-LEMS AND PROSPECTS. Edited by Ronald L. Hatchett. Texas A&M University Press, 1990. 224 Pages. \$29.50.

**GUNBOAT DIPLOMACY AND THE BOMB:** NUCLEAR PROLIFERATION AND THE U.S. NAVY. By Eric H. Arnett. Praeger. 175 Pages.

A TREASURY OF CIVIL WAR TALES. By Webb Garrison. First published in 1988. Ballantine Books, 1990. 261 Pages. \$4.95, Softbound.

FLYING START: A FIGHTER PILOT'S WAR YEARS. By Hugh Dundas. A Thomas Dunne Book. St. Martin's Press, 1990. 180 Pages. \$16.95, Softbound.

THE HISTORY OF CAVALRY. By Zuonimir Grbasic and Velimir Vuksic. Facts on File, 1989. 280 Pages. \$40,00, Hardbound.

THE EMPIRE AT WAR. By John Bowie. David & Charles, 1990. 127 Pages. \$29.95.

A PERSONAL STORY OF THE BATTLE FOR TUMBLEDOWN MOUNTAIN AND ITS AFTERMATH. By John Lawrence and Robert Lawrence. David & Charles, 1990. 196 Pages.

APOCALYPSE UNDONE: MY SURVIVAL OF JAPANESE IMPRISONMENT DURING WORLD WAR II. By Preston John Hubbard. Vanderbilt University Press, 1990. 263 Pages.

FIGHTING WORDS: THE CORRESPOND-ENTS OF WORLD WAR II. By Richard Collier. A Thomas Dunne Book. St. Martin's Press, 1990. 230 Pages. \$17.95.

ONE SHOT-ONE KILL. By Charles W. Sasser and Craig Roberts. Pocket Books, 1990. 260 Pages. \$4.95.

UNTOLD STORIES FROM THE FALK-LANDS WAR. By Michael Bilton and Peter Kosminsky. David & Charles, 1990. 311 Pages.

PACIFIC MICROPHONE. By William J. Dunn. Texas A&M University Press, 1988.

THE DESERT GENERALS. By Correlli Barnett. Indiana University Press, 1983. 351 Pages. \$17.95.-

## From the Editor

### INFANTRY SCHOOL DIRECTORY

The following directory is offered as an aid to people in the field who may have questions they want to ask the various departments and divisions of the Infantry School. All telephone numbers are DSN. To call the Fort Benning numbers on commercial lines, dial area code 404 and convert 835 prefixes to 545 and 784 prefixes to 544.

In addition to these points of contact, the

Infantry School maintains a hotline specifically to receive questions and comm ents from the field. The number is DSN 835-7693; commercial (404) 545-7693. Questions are recorded, and answers are returned within 48 hours. Lengthy questions or comments should be sent in writing to Commandant, USAIS, ATTN: ATSHES, Fort Benning, GA 31905-5420.

	·		
Assistant Commandant		Systems Division	835-2571
BG Carl F. Ernst	835-5296	Training Division	835-5620
Deputy Assistant Commandant		Ranger Training Brigade	
COL Stephen O. Perry	835-5231	Commander, COL John J. Maher III	784-6980
Executive Officer		4th Ranger Training Battalion (Benning Phase)	784-6211
MAJ Lee A. Phillips	835-5232	5th Ranger Training Battalion (Mountain Phase)	797-2415
Command Sergeant Major		6th Ranger Training Battalion (Florida Phase)	872-1162
Vacant	835-2813	7th Ranger Training Battalion (Desert Phase)	789-4257
Combined Arms and Tactics Department		29th Infantry Regiment	
Director (vacant)	835-4539	Commander, COL Gregory C. Camp	784-6008
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Doctrine Division	835-7162	1st Battalion, 29th Infantry Regiment	784-4060
Leadership Division	835-5610	Co A (OSUT BIFV Training)	784-7422
Tactics Division	835-5726	Co B (Mortar Committee)	784-1450
Military History Division	835-7122	Co C (OSUT M113 Training)	784-1203
Directorate of Combat Developments		Co D (BIFV Committee)	784-2584
Director, COL Albert J. Nahas	835-1316	Co E (BIFV Committee)	784-3280
Concepts and Studies Division	835-2489	Bradley Instructor Company	784-6433
Materiel and Logistics Systems Division	835-1915	2d Battalion, 29th Infantry Regiment	784-6819
Organizations and Personnel Systems Division	835-3311	Co A (Land Navigation Committee)	784-6033
Test and Evaluation Division	835-3630	Co B (Antiarmor Committee)	784-6546
Directorate of Evaluation and Standardization		Co C (Small Arms Committee)	784-6806
Director, COL Gunter P. Seibert	835-5868	Co D (Tactics/Sniper Training)	784-6006
Analysis Division	835-1140	Sniper School	784-7455
Lessons Learned	835-1140	11th Infantry Regiment	
Evaluation Division	835-2518	Commander, COL Lawrence K. White	835-4301
Infantry Proponent Safety	835-5868	1st Battalion, 11th Infantry	835-1043
Directorate of Training and Doctrine		2d Battalion, 11th Infantry (IOBC)	835-1666
Director, COL Howard W. Crawford, Jr.	835-5717	3d Battalion, 11th Infantry (OCS)	835-4907
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